


**STATE OF UTAH**  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS AND MINING

FORM 3

AMENDED REPORT ☐**APPLICATION FOR PERMIT TO DRILL**

<b>2. TYPE OF WORK</b> DRILL NEW WELL <input checked="" type="checkbox"/> REENTER P&A WELL <input type="checkbox"/> DEEPEN WELL <input type="checkbox"/>				<b>1. WELL NAME and NUMBER</b> NBU 920-13B		
<b>4. TYPE OF WELL</b> Gas Well Coalbed Methane Well: NO				<b>3. FIELD OR WILDCAT</b> NATURAL BUTTES		
<b>6. NAME OF OPERATOR</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.				<b>5. UNIT or COMMUNITIZATION AGREEMENT NAME</b> NATURAL BUTTES		
<b>8. ADDRESS OF OPERATOR</b> P.O. Box 173779, Denver, CO, 80217				<b>7. OPERATOR PHONE</b> 720 929-6587		
<b>10. MINERAL LEASE NUMBER (FEDERAL, INDIAN, OR STATE)</b> UTU-0579		<b>11. MINERAL OWNERSHIP</b> FEDERAL <input checked="" type="checkbox"/> INDIAN <input type="checkbox"/> STATE <input type="checkbox"/> FEE <input type="checkbox"/>		<b>9. OPERATOR E-MAIL</b> mary.mondragon@anadarko.com		
<b>13. NAME OF SURFACE OWNER (if box 12 = 'fee')</b>				<b>12. SURFACE OWNERSHIP</b> FEDERAL <input type="checkbox"/> INDIAN <input checked="" type="checkbox"/> STATE <input type="checkbox"/> FEE <input type="checkbox"/>		
<b>15. ADDRESS OF SURFACE OWNER (if box 12 = 'fee')</b>				<b>14. SURFACE OWNER PHONE (if box 12 = 'fee')</b>		
<b>17. INDIAN ALLOTTEE OR TRIBE NAME (if box 12 = 'INDIAN')</b> Ute				<b>16. SURFACE OWNER E-MAIL (if box 12 = 'fee')</b>		
<b>18. INTEND TO COMMINGLE PRODUCTION FROM MULTIPLE FORMATIONS</b> YES <input type="checkbox"/> (Submit Commingling Application) NO <input checked="" type="checkbox"/>		<b>19. SLANT</b> VERTICAL <input checked="" type="checkbox"/> DIRECTIONAL <input type="checkbox"/> HORIZONTAL <input type="checkbox"/>				
<b>20. LOCATION OF WELL</b>	<b>FOOTAGES</b>	<b>QTR-QTR</b>	<b>SECTION</b>	<b>TOWNSHIP</b>	<b>RANGE</b>	<b>MERIDIAN</b>
<b>LOCATION AT SURFACE</b>	925 FNL 1555 FEL	NWNE	13	9.0 S	20.0 E	S
<b>Top of Uppermost Producing Zone</b>	925 FNL 1555 FEL	NWNE	13	9.0 S	20.0 E	S
<b>At Total Depth</b>	925 FNL 1555 FEL	NWNE	13	9.0 S	20.0 E	S
<b>21. COUNTY</b> UINTAH		<b>22. DISTANCE TO NEAREST LEASE LINE (Feet)</b> 925		<b>23. NUMBER OF ACRES IN DRILLING UNIT</b> 1920		
		<b>25. DISTANCE TO NEAREST WELL IN SAME POOL (Applied For Drilling or Completed)</b> 1000		<b>26. PROPOSED DEPTH</b> MD: 10600 TVD:		
<b>27. ELEVATION - GROUND LEVEL</b> 4769		<b>28. BOND NUMBER</b> WYB000291		<b>29. SOURCE OF DRILLING WATER / WATER RIGHTS APPROVAL NUMBER IF APPLICABLE</b> Permit #43-8496		

**ATTACHMENTS****VERIFY THE FOLLOWING ARE ATTACHED IN ACCORDANCE WITH THE UTAH OIL AND GAS CONSERVATION GENERAL RULES**

<input checked="" type="checkbox"/> WELL PLAT OR MAP PREPARED BY LICENSED SURVEYOR OR ENGINEER	<input checked="" type="checkbox"/> COMPLETE DRILLING PLAN
<input type="checkbox"/> AFFIDAVIT OF STATUS OF SURFACE OWNER AGREEMENT (IF FEE SURFACE)	<input type="checkbox"/> FORM 5. IF OPERATOR IS OTHER THAN THE LEASE OWNER
<input type="checkbox"/> DIRECTIONAL SURVEY PLAN (IF DIRECTIONALLY OR HORIZONTALLY DRILLED)	<input checked="" type="checkbox"/> TOPOGRAPHICAL MAP
<b>NAME</b> Kevin McIntyre	<b>TITLE</b> Regulatory Analyst I
<b>SIGNATURE</b>	<b>PHONE</b> 720 929-6226
<b>API NUMBER ASSIGNED</b> 43047501520000	<b>DATE</b> 09/25/2008
<b>APPROVAL</b>	<b>EMAIL</b> Kevin.McIntyre@anadarko.com
 Permit Manager	

Proposed Hole, Casing, and Cement						
String	Hole Size	Casing Size	Top (MD)	Bottom (MD)		
Surf	12.25	9.625	0	2800		
Pipe	Grade	Length	Weight			
	Grade J-55 LT&C	2800	36.0			
	Cement Interval	Top (MD)	Bottom (MD)			
		0	2800			
		Cement Description	Class	Sacks	Yield	Weight
			Premium Foamed Cement	215	1.18	15.6

Proposed Hole, Casing, and Cement						
String	Hole Size	Casing Size	Top (MD)	Bottom (MD)		
Prod	7.875	4.5	0	10600		
Pipe	Grade	Length	Weight			
	Grade I-80 LT&C	10600	11.6			
	Cement Interval	Top (MD)	Bottom (MD)			
		0	10600			
		Cement Description	Class	Sacks	Yield	Weight
			Premium Lite High Strength	510	3.38	11.0
			Pozzuolanic Cement	1660	1.31	14.3



# KERR-McGEE OIL & GAS ONSHORE LP **DRILLING PROGRAM**

COMPANY NAME KERR-McGEE OIL & GAS ONSHORE LP DATE September 11, 2008  
 WELL NAME NBU 920-13B TD 10,000' MD/TVD  
 FIELD Natural Buttes COUNTY Uintah STATE Utah ELEVATION 4,769' GL KB 4,784'  
 SURFACE LOCATION NWNE 925' FNL & 1655' FEL, Sec. 13, T 9S R 20E BHL Straight Hole  
 Latitude: 40.040330 Longitude: -109.610710 NAD 27  
 OBJECTIVE ZONE(S) Mesaverde  
 ADDITIONAL INFO Regulatory Agencies: BLM (MINERALS), BIA (SURFACE), UDOGM, Tri-County Health Dept.

GEOLOGICAL FORMATION			MECHANICAL		
LOGS	TOPS	DEPTH	HOLE SIZE	CASING SIZE	MUD WEIGHT
		40'		14"	
			12-1/4"	9-5/8", 36#, J-55, LTC	Air mist
Catch water sample, if possible, from 0 to 5,189'					
	Green River @	1,779'			
	Top of Birds Nest Water @	2,038'			
	Mahogany @	2,558'			
	Preset f/ GL @				
	2,800' MD				
Note: 12.25" surface hole will usually be drilled ±400' below the bottom of lost circulation zone. Drilled depth may be ±200' of the estimated set depth depending on the actual depth of the loss zone.					
Mud logging program TBD					
Open hole logging program f/ TD - surf csg					
	Wasatch @	5,189'	7-7/8"	4-1/2", 11.6#, I-80 or equivalent LTC casing	Water/Fresh Water Mud 8.3-11.5 ppg
	Mverde @	8,378'			
	MVU2 @	9,380'			
	MVL1 @	9,897'			
					Max anticipated Mud required 12.5 ppg
		TD @ 10,000'			



KERR-McGEE OIL & GAS ONSHORE LP



Kerr McGee

## DRILLING PROGRAM

## CASING PROGRAM

	SIZE	INTERVAL	WT.	GR.	CPLG.	DESIGN FACTORS		
						BURST	COLLAPSE	TENSION
CONDUCTOR	14"	0-40'				3520	2020	453000
SURFACE	9-5/8"	0 to 2,800'	38.00	J-55	LTC	0.77	1.54	5.13
						7780	0350	201000
PRODUCTION	4-1/2"	0 to 10800	11.80	I-80	LTC	1.71	0.92	1.87

1) Max Anticipated Surf. Press. (MASP) (Surface Casing) = (Pore Pressure at next csg point - (0.22 psi/ft - partial evac gradient x TVD of next csg point))

2) MASP (Prod Casing) = Pore Pressure at TD - (.22 psi/ft - partial evac gradient x TD)

(Burst Assumptions: TD = 12.5 ppg)

.22 psi/ft = gradient for partially evac wellbore

(Collapse Assumption: Fully Evacuated Casing, Max MW)

(Tension Assumptions: Air Weight of Casing \* Buoy. Fact. of water)

MASP 4240 psi

## CEMENT PROGRAM

		FT. OF FILL	DESCRIPTION	SACKS	EXCESS	WEIGHT	YIELD
SURFACE	LEAD	500	Premium cmt + 2% CaCl + .25 pps floccle	215	60%	15.80	1.18
Option 1	TOP OUT CMT (1)	250	20 gals sodium silicate + Premium cmt + 2% CaCl + .25 pps floccle	100		15.80	1.18
	TOP OUT CMT (2)	as required	Premium cmt + 2% CaCl	as req.		15.60	1.18
SURFACE	LEAD	2000	NOTE: If well will circulate water to surface, option 2 will be utilized Prem cmt + 16% Gel + 10 pps gilsonite + .25 pps Floccle + 3% salt BWOC	230	35%	11.00	3.82
Option 2	TAIL	500	Premium cmt + 2% CaCl + .25 pps floccle	180	35%	15.60	1.18
	TOP OUT CMT	as required	Premium cmt + 2% CaCl	as req.		15.60	1.18
PRODUCTION	LEAD	4,680'	Premium Lite II + 3% KCl + 0.25 pps celloflake + 5 pps gilsonite + 10% gel + 0.5% extender	510	60%	11.00	3.38
	TAIL	5,920'	50/50 Poz/G + 10% salt + 2% gel + .1% R-3	1660	60%	14.30	1.31

\*Substitute caliper hole volume plus 0% excess for LEAD if accurate caliper is obtained

\*Substitute caliper hole volume plus 10% excess for TAIL if accurate caliper is obtained

## FLOAT EQUIPMENT &amp; CENTRALIZERS

SURFACE	Guide shoe, 1 jt, insert float. Centralize first 3 joints with bow spring centralizers. Thread lock guide shoe.
PRODUCTION	Float shoe, 1 jt, float collar. Centralize first 3 joints & every third joint to top of tail cement with bow spring centralizers.

## ADDITIONAL INFORMATION

Test casing head to 750 psi after installing. Test surface casing to 1,500 psi prior to drilling out.

BOPE: 11" 5M with one annular and 2 rams. Test to 5,000 psi (annular to 2,500 psi) prior to drilling out. Record on chart recorder &amp;

tour sheet. Function test rams on each trip. Maintain safety valve &amp; inside BOP on rig floor at all times. Kelly to be equipped with upper

&amp; lower kelly valves.

Drop Totco surveys every 2000'. Maximum allowable hole angle is 5 degrees.

Most rigs have PVT Systems for mud monitoring. If no PVT is available, visual monitoring will be utilized.

DRILLING ENGINEER:

Brad Laney

DATE: \_\_\_\_\_

DRILLING SUPERINTENDENT:

Randy Bayne

DATE: \_\_\_\_\_

**NBU 920-13B  
NWNE Sec. 13, T9S, R20E  
UINTAH COUNTY, UTAH  
UTU-0579**

**ONSHORE ORDER NO. 1**

***DRILLING PROGRAM***

**1. Estimated Tops of Important Geologic Markers:**

<u>Formation</u>	<u>Depth</u>
Uinta	0- Surface
Green River	1779'
Bird's Nest	2038'
Mahogany	2558'
Wasatch	5189'
Mesaverde	8378'
MVU2	9380'
MVL1	9897'
TD	10,600'

**2. Estimated Depths of Anticipated Water, Oil, Gas, or Mineral Formations:**

<u>Substance</u>	<u>Formation</u>	<u>Depth</u>
	Green River	1779'
	Bird's Nest	2038'
	Mahogany	2558'
Gas	Wasatch	5189'
Gas	Mesaverde	8378'
Gas	MVU2	9380'
Gas	MVL1	9897'
Water	N/A	
Other Minerals	N/A	

**3. Pressure Control Equipment (Schematic Attached)**

*Please see the Natural Buttes Unit Standard Operating Procedure (SOP).*

**4. Proposed Casing & Cementing Program:**

*Please see the Natural Buttes Unit SOP. See attached drilling diagram.*

**5. Drilling Fluids Program:**

*Please see the Natural Buttes Unit SOP.*

6. **Evaluation Program:**

*Please see the Natural Buttes Unit SOP.*

7. **Abnormal Conditions:**

Maximum anticipated bottomhole pressure calculated at 10,600' TD, approximately equals 6572 psi (calculated at 0.62 psi/foot).

Maximum anticipated surface pressure equals approximately 4240 psi (bottomhole pressure minus the pressure of a partially evacuated hole calculated at 0.22 psi/foot).

8. **Anticipated Starting Dates:**

*Drilling is planned to commence immediately upon approval of this application.*

9. **Variances:**

*Please see Natural Buttes Unit SOP Onshore Order #2 – Air Drilling Variance  
Kerr-McGee Oil & Gas Onshore LP (KMG) respectfully requests a variance to several requirements associated with air drilling outlined in Onshore Order 2*

- *Blowout Prevention Equipment (BOPE) requirements;*
- *Mud program requirements; and*
- *Special drilling operation (surface equipment placement) requirements associated with air drilling.*

*This Standard Operating Practices addendum provides supporting information as to why KMG current air drilling practices for constructing the surface casing hole should be granted a variance to Onshore Order 2 air drilling requirements.*

*The reader should note that the air rig is used only to construct a stable surface casing hole through a historically difficult lost circulation zone. A conventional rotary rig follows the air rig, and is used to drill and construct the majority of the wellbore.*

*More notable, KMG has used the air rig layout and procedures outlined below to drill the surface casing hole in approximately 675 wells without incident of blow out or loss of life.*

*Background*

*In a typical well, KMG utilizes an air rig for drilling the surface casing hole, an interval from the surface to surface casing depths, which varies in depth from 1,700 to 2,800 feet.*

*The air rig drilling operation does not drill through productive or over pressured formations in KMG field, but does penetrate the Uinta and Green River Formations. The purpose of the air drilling operation is to overcome the severe loss circulation zone in the Green River known as the Bird's Nest while creating a stable hole for the surface casing. The surface casing hole is generally drilled to approximately 500 feet below the Bird's Nest.*

*Before the surface air rig is mobilized, a rat hole rig is utilized to set and cement conductor pipe through a competent surface formation. Generally, the conductor is set at 40 feet. In some cases, conductor may be set deeper in areas that the surface formation is not found competent. This rig also drills the rat and mouse holes in preparation for the surface casing and production string drilling operations.*

The air rig is then mobilized to drill the surface casing hole by drilling a 12-1/4 inch hole to just above the Bird's Nest interval with an air hammer. The hammer is then tripped and replaced with a 12-1/4 inch tri-cone bit. The tri-cone bit is used to drill to the surface casing point, approximately 500 feet below the loss circulation zone (Bird's Nest). The 9-5/8 inch surface casing is then run and cemented in place, thereby isolating the lost circulation zone.

KMG fully appreciates Onshore Order 2 well control and safety requirements associated with a typical air drilling operations. However, the requirements of Onshore Order 2 are excessive with respect to the air rig layout and drilling operation procedures that are currently in practice to drill and control the surface casing hole in KMG Fields.

#### *Variance for BOPE Requirements*

The air rig operation utilizes a properly lubricated and maintained air bowl diverter system which diverts the drilling returns to a six-inch blooie line. The air bowl is the only piece of BOPE equipment which is installed during drilling operations and is sufficient to contain the air returns associated with this drilling operation. As was discussed earlier, the drilling of the surface hole does not encounter any over pressured or productive zones, and as a result standard BOPE equipment should not be required. In addition, standard drilling practices do not support the use of BOPE on 40 feet of conductor pipe.

#### *Variance for Mud Material Requirements*

Onshore Order 2 also states that sufficient quantities of mud materials shall be maintained or readily accessible for the purpose of assuring adequate well control. Once again, the surface hole drilling operations does not encounter over pressured or productive intervals, and as a result there is not a need to control pressure in the surface hole with a mud system. Instead of mud, the air rigs utilize water from the reserve pit for well control, if necessary. A skid pump which is located near the reserve pit (see attachment) will supply the water to the well bore.

#### *Variance for Special Drilling Operation (surface equipment placement) Requirements*

Onshore Order 2 requires specific safety distances or setbacks for the placement of associated standard air drilling equipment, wellbore, and reserve pits. The air rigs used to drill the surface holes are not typical of an air rig used to drill a producing hole in other parts of the US. These are smaller in nature and designed to fit a KMG location. The typical air rig layout for drilling surface hole in the field is attached.

Typically the blooie line discharge point is required to be 100 feet from the well bore. In the case of a KMG well, the reserve pit is only 45 feet from the rig and is used for the drill cuttings. The blooie line, which transports the drill cuttings from the well to the reserve pit, subsequently discharges only 45 feet from the well bore.

Typically the air rig compressors are required to be located in the opposite direction from the blooie line and a minimum of 100 feet from the well bore. At the KMG locations, the air rig compressors are approximately 40 feet from the well bore and approximately 60 feet from the blooie line discharge due to the unique air rig design. The air compressors (see attachment) are located on the rig (1250 cfm) and on a standby trailer (1170 cfm). A booster sits between the two compressors and boosts the output from 350 psi to 2000 psi. The design does put the booster and standby compressor opposite from the blooie line.

*Lastly, Onshore Order 2 addresses the need for an automatic igniter or continuous pilot light on the blooie line. The air rig does not utilize an igniter as the surface hole drilling operation does not encounter productive formations.*

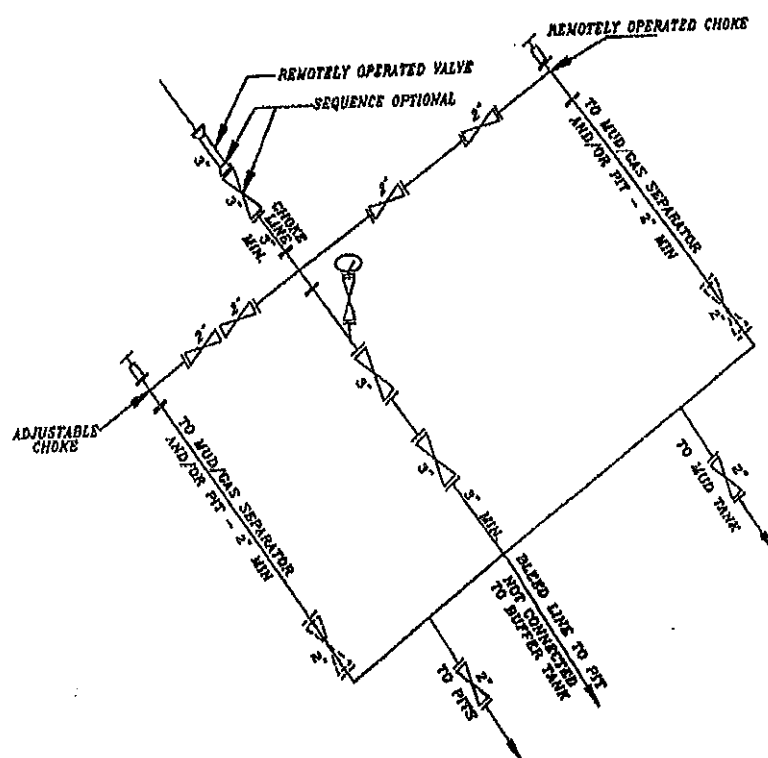
*Conclusion*

*The air rig operating procedures and the attached air rig layout have effectively maintained well control while drilling the surface holes in KMG Fields. KMG respectfully requests a variance from Onshore Order 2 with respect to air drilling well control requirements as discussed above..*

**10. Other Information:**

*Please see Natural Buttes Unit SOP.*

A schematic diagram of a wellhead assembly. At the top is a vertical pipe labeled "DRILLING NIPPLE". A horizontal pipe labeled "FLOW LINE" branches off to the right. To the left, a horizontal pipe labeled "FILLUP LINE" branches off, containing a valve symbol (a rectangle with an 'X'). Below the drilling nipple is a rectangular component labeled "HYDRIL". Underneath that is another rectangular component labeled "PIPE RAMS" and "BLIND RAMS". Below this is a "DRILLING SPOOL". A horizontal pipe passes through the spool, with a section of it shown as a double line. This pipe has two branches: one to the left labeled "KILL LINE 2\" MIN. (2 KILL LINE VALVES AND A CHECK VALVE-2\" MIN.)" and one to the right labeled "CHOKE LINE 3\" MIN.". Below the drilling spool is a "CASING HEAD" with a pipe passing through it. The diagram is a technical line drawing with labels and arrows pointing to specific parts.



**SCHEMATIC DIAGRAM OF 5,000 PSI BOP STACK**

**NBU 920-13B  
NWNE Sec. 13 ,T9S,R20E  
UINTAH COUNTY, UTAH  
UTU-0579**

**ONSHORE ORDER NO. 1**

***MULTI-POINT SURFACE USE & OPERATIONS PLAN***

**1. Existing Roads:**

Refer to the attached location directions.

Refer to Topo Maps A and B for location of access roads within a 2-mile radius.

**2. Planned Access Roads:**

Approximately 55' +/- of new access road is proposed. Refer to Topo Map B.

*Existence of pipelines; maximum grade; turnouts; major cut and fills, culverts, or bridges; gates, cattle guards, fence cuts, or modifications to existing facilities were determined at the on-site.*

*Please see the Natural Buttes Unit Standard Operating Procedure (SOP).*

**3. Location of Existing Wells Within a 1-Mile Radius:**

Please refer to Topo Map C.

**4. Location of Existing & Proposed Facilities:**

*Please see the Natural Buttes Unit SOP.*

Refer to Topo Map D for the location of the proposed pipelines.

**A right-of-way is required for the pipeline. The pipeline is approximately 306' in length and 30' in width. A 4" surface steel pipeline will be constructed utilizing existing disturbance where possible. The pipeline will be butt-welded together and pulled into place with a rubber tired tractor.**

**Variances to Best Management Practices (BMPs) Requested:**

Approximately 306' of 4" steel pipeline will be installed on surface within the access corridor for the well location. As a Best Management Practice (BMP), the pipeline would be buried within the access road corridor if possible. The construction of pipelines requires the corridor of 30 feet.

This exception to the BMP should be granted by the BLM Authorized Officer because indurated bedrock, such as sandstone, is at or within 2 feet of the surface and the soil has a poor history for successful rehabilitation.

All facilities will be painted within six months of installation. Facilities required to comply with the Occupational Safety and Health Act (OSHA) will be excluded. The requested color is Shadow gray (2.5Y 6/2), a non-reflective earthtone.

**Interim Surface Reclamation Plan:**

This exception is requested due to the current twin and multi-well program. If determined that this well will not be a candidate for either twinning &/or multi-well the operator shall spread the topsoil pile on the location up to the rig anchor points. The location will be reshaped to the original contour to the extent possible. The operator will reseed the area using the BLM recommended seed mixture and reclamation methods.

**5. Location and Type of Water Supply:**

*Please see the Natural Buttes SOP.*

**6. Source of Construction Materials:**

*Please see the Natural Buttes SOP.*

**7. Methods of Handling Waste Materials:**

*Please see the Natural Buttes SOP.*

A plastic reinforced liner is to be used as discussed during on-site inspection. It will be a minimum of 20 mil thick and felt, with sufficient bedding used to cover any rocks. The liner will overlap the pit walls and be covered with dirt and/or rocks to hold it in place. No trash or scrap that could puncture the liner will be disposed of in the pit.

Any produced water from the proposed well will be contained in a water tank and will then be hauled by truck to one of the pre-approved disposal sites: RNI, Sec. 5, T9S, R22E, NBU #159, Sec. 35, T9S R21E, Ace Oilfield, Sec. 2, T6S, R20E, MC&MC, Sec. 12, T6S, R19E, Pipeline Facility Sec. 36, T9S, R20E, Goat Pasture Evaporation Pond SW/4 Sec. 16, T10S, R22E, Bonanza Evaporation Pond Sec. 2, T10S, R23E (*Request is in lieu of filing Form 3160-5, after initial production*).

**8. Ancillary Facilities:**

*Please see the Natural Buttes SOP.*



9. **Well Site Layout:** (See Location Layout Diagram)

The attached Location Layout Diagram describes drill pad cross-sections, cuts and fills, and locations of the mud tanks, reserve pit, flare pit, pipe racks, trailer parking, spoil dirt stockpile(s), and surface material stockpile(s).

Please see the attached diagram to describe rig orientation, parking areas, and access roads.

Location size may change prior to the drilling of the well due to the current rig availability. If the proposed location is not large enough to accommodate the drilling rig. The location will be re-surveyed and a form 3160-5 will be submitted.

10. **Plans for Reclamation of the Surface:**

*Please see the Natural Buttes SOP.*

Upon reclamation of the pit the following seed mixture will be used. A total of 12 lbs/acre will be used if the seeds are drilled (24 lbs/acre if the seeds are broadcast). The per acre requirements for *drilled* seed are:

Crested Wheatgrass      12 lbs.

Operator shall call the BLM for the seed mixture when final reclamation occurs.

11. **Surface/Mineral Ownership:**

The well pad and access road are located on lands owned by:

Ute Indian Tribe  
P.O. Box 70  
Fort Duchesne, Utah 84026  
(435) 722-5141

The mineral ownership is listed below:

United States of America  
Bureau of Land Management  
170 South 500 East  
Vernal, UT 84078  
(435) 781-4400

**12. Stipulations/Notices/Mitigation:**

There are no stipulations or notices for this location.

**13. Other Information:**

A Class III archaeological survey and a paleontological survey have been performed and will be submitted.

This location is not within 460' from the boundary of the Natural Buttes Unit, nor is it within 460' of any non-committed tract lying within the boundaries of the Unit.

**14. Lessee's or Operator's Representative & Certification:**

Kevin McIntyre  
Regulatory Analyst  
Kerr-McGee Oil & Gas Onshore LP  
P.O. Box 173779  
Denver, CO 80217-3779  
(720) 929-6226

Randy Bayne  
Drilling Manager  
Kerr-McGee Oil & Gas Onshore LP  
1368 South 1200 East  
Vernal, UT 84078  
(435) 781-7018

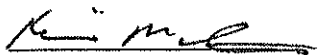
Certification: All lease and/or unit operations will be conducted in such a manner that full compliance is made with all applicable laws, regulations, Onshore Oil and Gas Orders, the approved Plan of Operations, and any applicable Notice to Lessees.

Kerr-McGee Oil & Gas Onshore LP is considered to be the operator of the subject well. Kerr-McGee Oil & Gas Onshore LP agrees to be responsible under the terms and conditions of the lease for the operations conducted upon leased lands.

The Operator will be fully responsible for the actions of its subcontractors. A complete copy of the approved "Application for Permit to Drill" will be furnished to the field representative(s) to ensure compliance and shall be on location during all construction and drilling operations.

Bond coverage pursuant to 43 CFR 3104 for lease activities is being provided by Bureau of Land Management Nationwide Bond #WYB000291.

I hereby certify that I, or persons under my supervision, have inspected the proposed drill site and access route, that I am familiar with the conditions that currently exist; that the statements made in this plan are, to the best of my knowledge, true and correct; and the work associated with the operations proposed herein will be performed by the Operator, its contractors, and subcontractors in conformity with this plan and the terms and conditions under which it is approved.

  
Kevin McIntyre

9/11/2008

Date

**T9S, R20E, S.L.B.&M.**Found 1968  
Brass Cap.  
Pile of Stones.S88°53'W 40.48 (G.L.O.)  
S88°55'40"W - 2670.83' (Meas.)S88°55'W 39.58 (G.L.O.)  
S88°55'55"W - 2612.51' (Meas.)Found 1968  
Brass Cap.  
Pile of Stones.N0°04'W 80.24 (G.L.O.)  
N00°02'35"W - 2648.71' (Meas.)Found 1968  
Brass Cap.  
Pile of Stones.Found 1968  
Brass Cap.  
Pile of Stones.Proposed  
Well

925'

1555'

N01°03'42"W - 2562.34' (Meas.)  
N1°04'W 38.88 (G.L.O.)Found 1968  
Brass Cap.  
Pile of Stones.**13****WELL LOCATION:  
NBU 920-13B**

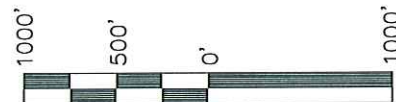
ELEV. UNGRADED GROUND = 4768.9'

NBU 920-13B (Proposed Well Head)

NAD 83 LATITUDE = 40.04029° (40° 02' 25.05")  
 LONGITUDE = 109.61140° (109° 36' 41.03")  
 NAD 27 LATITUDE = 40.04033° (40° 02' 25.18")  
 LONGITUDE = 109.61071° (109° 36' 38.55")

Found 1968  
Brass Cap.  
Pile of Stones.S88°26'58"W - 2692.14' (Meas.)  
S88°26'W 81.58 (G.L.O.)Found 1968  
Brass Cap.  
Pile of Stones.N01°10'09"W (Basis of Bearings)  
2690.10' (Measured)  
N1°09'W 40.76 (G.L.O.)**NOTES:**

- ▲ = Section Corners Located
- Well footages are measured at right angles to the Section Lines.
  - G.L.O. distances are shown in feet or chains. 1 chain = 66 feet.
  - Bearings are based on Global Positioning Satellite observations.
  - Basis of elevation is the Northwest Corner of Section 12, T9S, R20E, S.L.B.&M. The elevation of this Section Corner is shown on the Ouray SE 7.5 Min. Quadrangle as being 4676'.



SCALE

**SURVEYOR'S CERTIFICATE**

THIS IS TO CERTIFY THAT THE ABOVE PLAT WAS PREPARED FROM FIELD NOTES OF ACTUAL SURVEYS MADE BY ME OR UNDER MY SUPERVISION AND THAT THE SAME ARE TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

REGISTERED LAND SURVEYOR  
 REGISTRATION No. 6028691  
 STATE OF UTAH

No. 6028691  
 JOHN D. SLAUGH  
 SURVEYOR

**Kerr-McGee****Oil & Gas Onshore, LP**

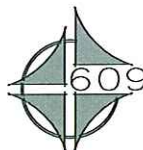
1099 18th Street - Denver, Colorado 80202

NBU 920-13B

WELL PLAT

925' FNL, 1555' FEL

NW ¼ NE ¼ OF SECTION 13, T9S, R20E,  
 S.L.B.&M. UINTAH COUNTY, UTAH.



CONSULTING, LLC

371 Coffeen Avenue  
 Sheridan WY 82801  
 Phone 307-674-0609  
 Fax 307-674-0182

**TIMBERLINE**

(435) 789-1365

**ENGINEERING & LAND SURVEYING, INC.**

38 WEST 100 NORTH - VERNAL, UTAH 84078

DATE SURVEYED:

07-29-08

DATE DRAWN:

07-31-08

SCALE: 1" = 1000'

SURVEYED BY: B.J.S.

DRAWN BY: M.W.W.

Date Last Revised:

SHEET

1

OF 9

WELL LOCATION  
 ----- EXISTING CONTOURS (2' INTERVAL)  
 \_\_\_\_\_ PROPOSED CONTOURS (2' INTERVAL)

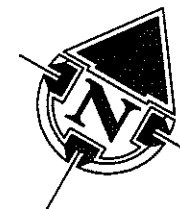
EXISTING GRADE @ LOC. STAKE = 4,768.9'  
FINISHED GRADE ELEVATION = 4,768.0'  
CUT SLOPES = 1.5:1  
FILL SLOPES = 1.5:1

TOTAL CUT FOR WELL PAD = 6,337 C.Y.  
TOTAL FILL FOR WELL PAD = 5,695 C.Y.  
TOPSOIL @ 6" DEPTH = 2,971 C.Y.  
TOTAL DISTURBANCE = 3.68 ACRES  
SHRINKAGE FACTOR = 1.15  
SWELL FACTOR = 1.00  
RESERVE PIT CAPACITY (2' OF FREEBOARD)  
+/- 25,880 BARRELS  
RESERVE PIT VOLUME  
+/- 7,185 CY  
BACKFLOW PIT CAPACITY (2' OF FREEBOARD)  
+/- 8,780 BARRELS  
BACKFLOW PIT VOLUME  
+/- 2,520 CY

NBU 920-13B  
WELL PAD - LOCATION LAYOUT  
925' FNL, 1555' FEL  
NW1/4NE1/4, SECTION 13, T.9S., R.20E.  
S.L.B.&M., UINTAH COUNTY, UTAH

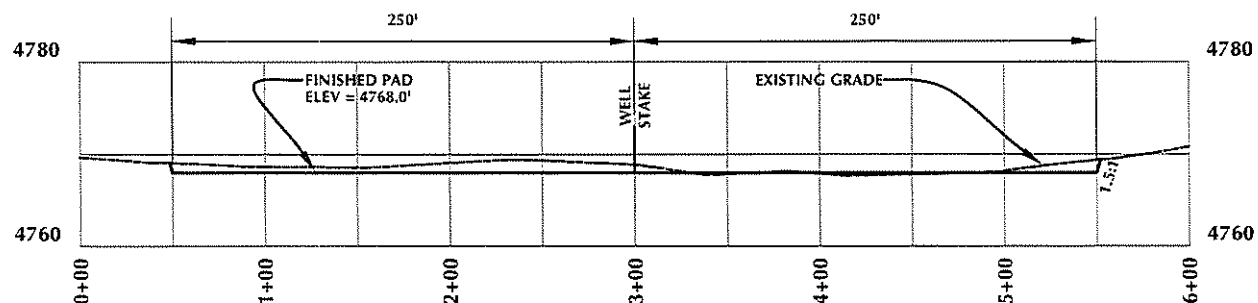
**CONSULTING, LLC**  
371 Coffeen Avenue  
Sheridan WY 82801  
Phone 307-674-0609  
Fax 307-674-0182

Scale: 1"=100'	Date: 8/15/08	SHEET NO:  <b>2</b>  2 OF 9
REVISIONS: BY DATE _____		

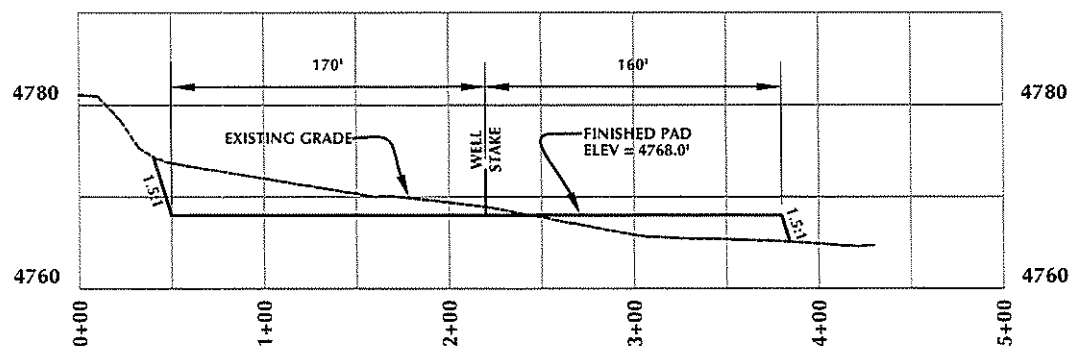


HORIZONTAL  1" = 100'

**Timberline** (435) 789-1365  
Engineering & Land Surveying, Inc.  
38 WEST 100 NORTH VERNAL, UTAH 84078



**CROSS SECTION A-A'**



**CROSS SECTION B-B'**

**KERR-MCGEE OIL & GAS  
ONSHORE L.P.**

1099 18th Street - Denver, Colorado 80202



**CONSULTING, LLC**  
371 Coffeen Avenue  
Sheridan WY 82801  
Phone 307-674-0609  
Fax 307-674-0182

**NBU 920-13B  
WELL PAD - CROSS SECTIONS**  
925' FNL, 1555' FEL  
NW1/4NE1/4, SECTION 13, T.9S., R.20E.  
S.L.B.&M., Uintah County, Utah

Scale: 1"=100'	Date: 8/15/08	SHEET NO:
REVISED:	BY DATE	<b>3</b>
		3 OF 9



HORIZONTAL 0 50 100 1" = 100'  
VERTICAL 0 10 20 1" = 20'

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*Engineering & Land Surveying, Inc.*  
38 WEST 100 NORTH VERNAL, UTAH 84078



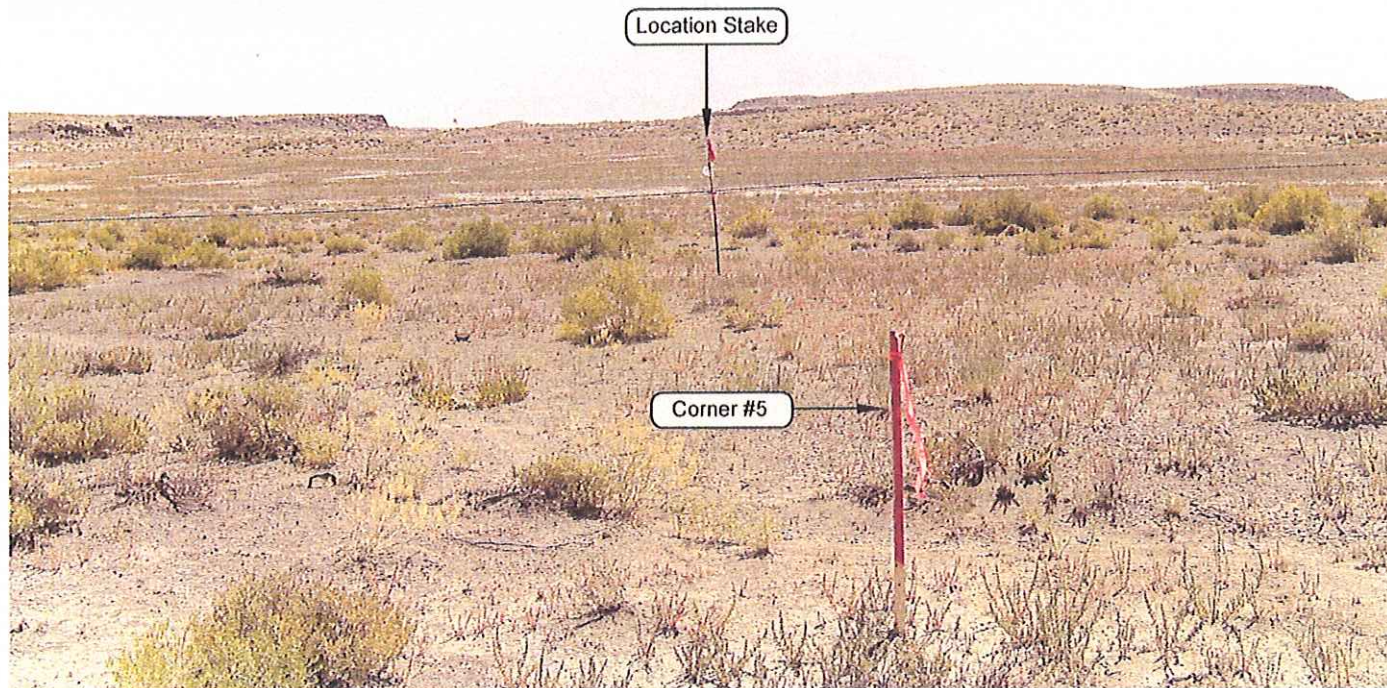


PHOTO VIEW: FROM CORNER #5 TO LOCATION STAKE

CAMERA ANGLE: EASTERLY

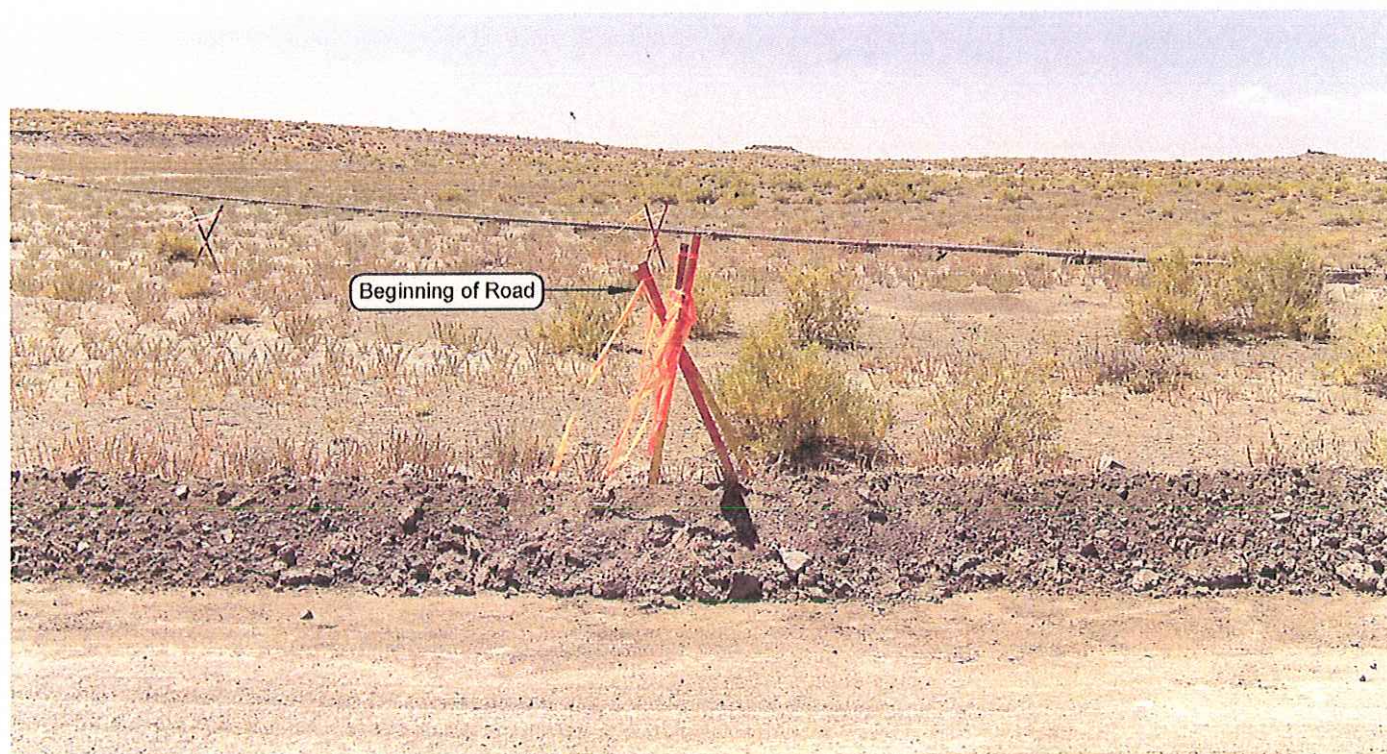
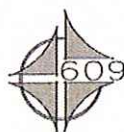


PHOTO VIEW: FROM BEGINNING OF PROPOSED ROAD

CAMERA ANGLE: SOUTHERLY

**Kerr-McGee**  
**Oil & Gas Onshore, LP**  
 1099 18th Street - Denver, Colorado 80202

NBU 920-13B  
 925' FNL, 1555' FEL  
 NW  $\frac{1}{4}$  NE  $\frac{1}{4}$  OF SECTION 13, T9S, R20E,  
 S.L.B.&M. UTAH COUNTY, UTAH.



CONSULTING, LLC  
 371 Coffeen Avenue  
 Sheridan WY 82801  
 Phone 307-674-0609  
 Fax 307-674-0182

**LOCATION PHOTOS**

DATE TAKEN: 07-29-08

DATE DRAWN: 07-31-08

TAKEN BY: B.J.S.

DRAWN BY: M.W.W.

REVISED:

**Timberline** (435) 789-1365  
**Engineering & Land Surveying, Inc.**  
 38 WEST 100 NORTH VERNAL, UTAH 84078

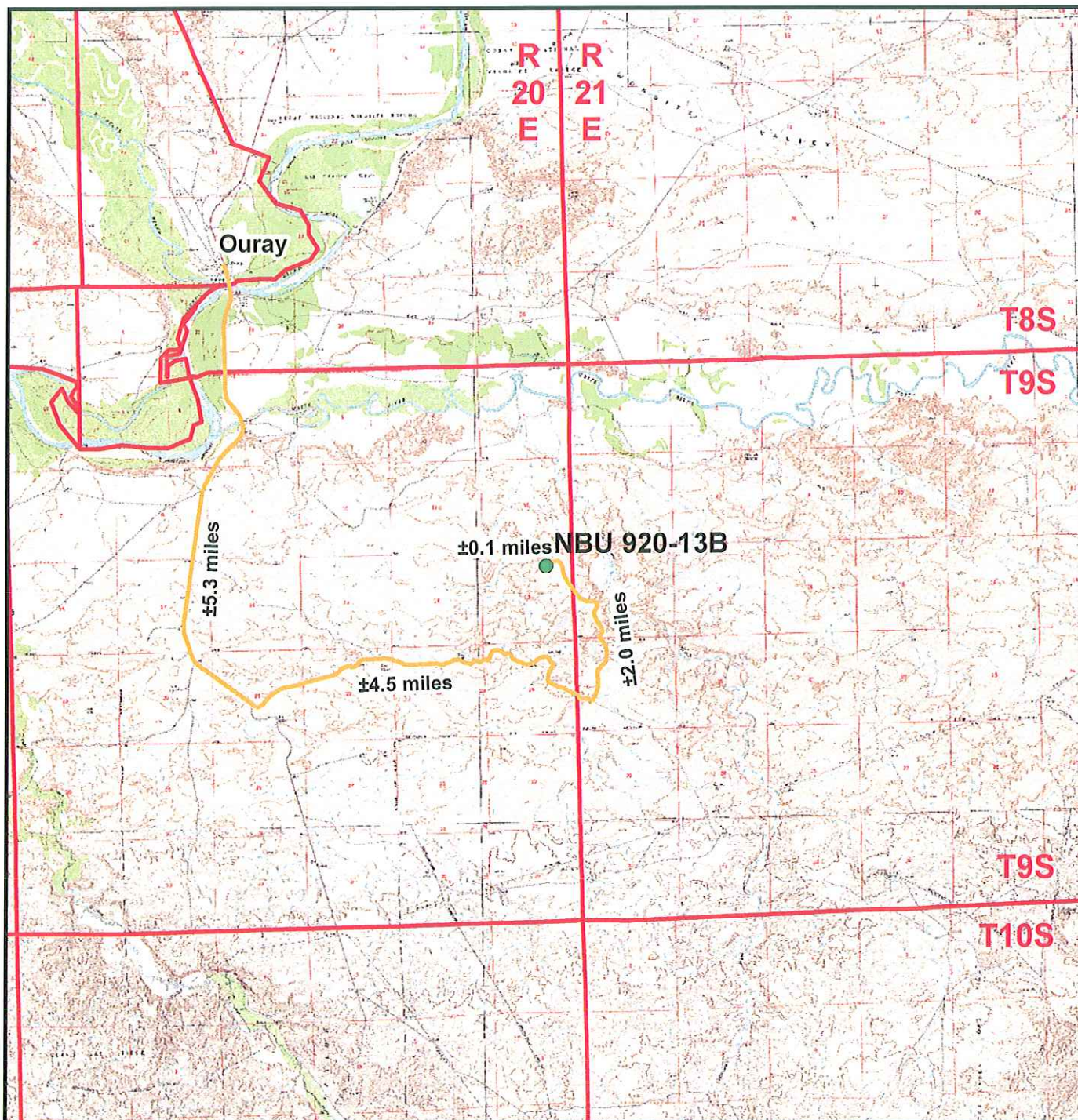
**SHEET**  
**4**  
**OF 9**



**Kerr-McGee Oil & Gas Onshore, LP**  
**NBU 920-13B**  
**Section 13, T9S, R20E, S.L.B.&M.**

PROCEED IN A WESTERLY DIRECTION FROM VERNAL, UTAH ALONG U.S. HIGHWAY 40 APPROXIMATELY 13.9 MILES TO THE JUNCTION OF STATE HIGHWAY 88. EXIT LEFT AND PROCEED IN A SOUTHERLY DIRECTION ALONG STATE HIGHWAY 88 APPROXIMATELY 16.8 MILES TO OURAY, UTAH. FROM OURAY, PROCEED IN A SOUTHERLY DIRECTION ALONG THE SEEP RIDGE ROAD (COUNTY B ROAD 2810) APPROXIMATELY 5.3 MILES TO THE INTERSECTION OF AN EXISTING ROAD TO THE EAST. EXIT LEFT AND PROCEED IN A NORTHEASTERLY THEN SOUTHEASTERLY DIRECTION ALONG EXISTING ROAD APPROXIMATELY 4.5 MILES TO THE INTERSECTION OF AN EXISTING ROAD TO THE NORTH. EXIT LEFT AND PROCEED IN A NORTHERLY THEN NORTHWESTERLY DIRECTION ALONG EXISTING ROAD APPROXIMATELY 1.9 MILES TO THE INTERSECTION OF AN EXISTING ROAD TO THE NORTHWEST. EXIT LEFT AND PROCEED IN A NORTHWESTERLY DIRECTION ALONG EXISTING ROAD APPROXIMATELY 0.1 MILES TO THE PROPOSED ACCESS ROAD. FOLLOW ROAD FLAGS IN A SOUTHERLY DIRECTION APPROXIMATELY 55 FEET TO THE PROPOSED WELL LOCATION.

TOTAL DISTANCE FROM VERNAL, UTAH TO THE PROPOSED WELL LOCATION IS APPROXIMATELY 42.5 MILES IN A SOUTHERLY DIRECTION.



### Legend

- Proposed NBU 920-13B Well Location
- Access Route - Proposed

Kerr-McGee Oil & Gas Onshore, LP  
1099 18th Street, Denver, Colorado 80202

NBU 920-13B  
Topo A  
925' FNL, 1555' FEL  
NW¼ NE¼, Section 13, T9S, R20E  
S.L.B.&M., Uintah County, Utah



CONSULTING, LLC  
371 Coffeen Avenue  
Sheridan, WY 82801  
Phone (307) 674-0609  
Fax (307) 674-0182

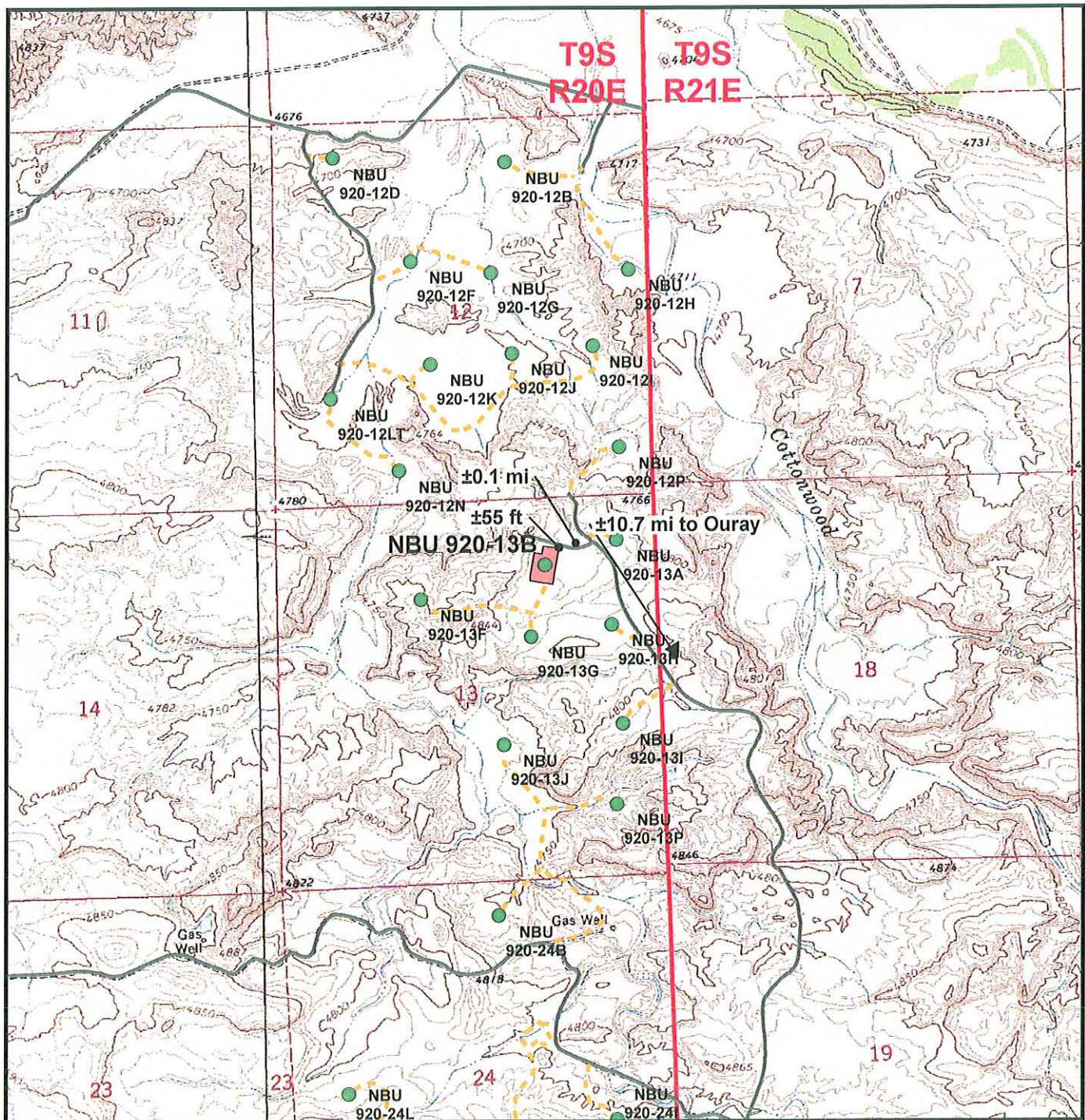


Scale: 1:100,000	NAD83 USP Central
Drawn: JELo	Date: 13 Aug 2008
Revised:	Date:

Sheet No:  
**5**

5 of 9



**Legend**

- Well - Proposed  
  Well Pad  
 --- Road - Proposed  
 --- Road - Existing

Total Proposed Road Length = ±55 ft

Kerr-McGee Oil & Gas Onshore, LP  
1099 18th Street, Denver, Colorado 80202

**NBU 920-13B**  
**Topo B**  
**925' FNL, 1555' FEL**  
**NW¼ NE¼, Section 13, T9S, R20E**  
**S.L.B.&M., Uintah County, Utah**

**CONSULTING, LLC**  
 371 Colleen Avenue  
 Sheridan, WY 82801  
 Phone (307) 674-0609  
 Fax (307) 674-0182



Scale: 1" = 2000ft	NAD83 USP Central	Sheet No:
Drawn: JELO	Date: 14 Aug 2008	6
Revised:	Date:	

6 of 9



Sheet No: 7 7 of 9



## 8 of 9

**IPC #08-142**

# **Paleontological Reconnaissance Survey Report**

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**Survey of Kerr McGee's Proposed Well Pads, Access Roads, and  
Pipelines for "NBU #920-12B, D, E, F, G, H, I, J & K;  
#920-13A, B & H" (Sec. 12 & 13, T 9 S, R 20 E)**

**Ouray SE  
Topographic Quadrangle  
Uintah County, Utah**

June 28, 2008

Prepared by Stephen D. Sandau  
Paleontologist for  
Intermountain Paleo-Consulting  
P. O. Box 1125  
Vernal, Utah 84078



## INTRODUCTION

At the request of Raleen White of Kerr McGee Onshore LP and authorized by Bruce Pargeets of the Ute Indian Tribe and by Lynn Becker, EMD Land Division Manager of the Ute Indian Tribe's Energy and Minerals Department, a paleontological reconnaissance survey of Kerr McGee's proposed well pads, access roads, and pipelines for "NBU #920-12B, D, E, F, G, H, I, J & K; #920-13A, B & H" (Sec. 12 & 13, T 9 S, R 20 E) was conducted by Stephen D. Sandau, Arica Scheetz and Amanda Dopheide on June 26, 2008. The survey was conducted under the Ute Indian Tribe Business License FY 2008, #A08-1308 and the accompanying Access Permit (effective 3/26/2008 through 9/30/2008). This survey to locate, identify and evaluate paleontological resources was done to meet requirements of the National Environmental Policy Act of 1969 and other State and Federal laws and regulations that protect paleontological resources.

## FEDERAL AND STATE REQUIREMENTS

As mandated by the Federal and State government, paleontologically sensitive geologic formations on State lands that are considered for exchange or may be impacted due to ground disturbance require paleontological evaluation. This requirement complies with:

- 1) The National Environmental Policy Act of 1969 (NEPA) (42 U.S.C. 4321.et. Seq., P.L. 91-190);
- 2) The Federal Land Policy and Management Act (FLPMA) of 1976 (90 Stat. 2743, 43 U.S.C. § 1701-1785, et. Seq., P.L. 94-579) and
- 3) The National Historic Preservation Act. 16 U.S.C. § 470-1, P.L. 102-575 in conjunction with 42 U.S.C. § 5320

The new Potential Fossil Yield Classification (PFYC) System (October, 2007) replaces the Condition Classification System from Handbook H-8270-1. Geologic units are classified based on the relative abundance of vertebrate fossils or scientifically significant invertebrate or plant fossils and their sensitivity to adverse impacts, with a higher class number indicating a higher potential.

- **Class 1 – Very Low.** Geologic units (igneous, metamorphic, or Precambrian) not likely to contain recognizable fossil remains.
- **Class 2 – Low.** Sedimentary geologic units not likely to contain vertebrate fossils or scientifically significant non-vertebrate fossils. (Including modern eolian, fluvial and colluvial deposits etc...)
- **Class 3 – Moderate or Unknown.** Fossiliferous sedimentary geologic units where fossil content varies in significance, abundance, and predictable occurrence; or sedimentary units of unknown fossil potential.
  - **Class 3a – Moderate Potential.** The potential for a project to be sited on or impact a significant fossil locality is low, but is somewhat higher for common fossils.
  - **Class 3b – Unknown Potential.** Units exhibit geologic features and preservational conditions that suggest significant fossils could be present, but little information about the paleontological resources of the unit or the area is known.

- **Class 4 – High.** Geologic units containing a high occurrence of vertebrate fossils or scientifically significant invertebrate or plant fossils, but may vary in abundance and predictability.
  - **Class 4a** – Outcrop areas with high potential are extensive (greater than two acres) and paleontological resources may be susceptible to adverse impacts from surface disturbing actions.
  - **Class 4b** – Areas underlain by geologic units with high potential but have lowered risks of disturbance due to moderating circumstances such as a protective layer of soil or alluvial material; or outcrop areas are smaller than two contiguous acres.
- **Class 5 – Very High.** Highly fossiliferous geologic units that consistently and predictably produce vertebrate fossils or scientifically significant invertebrate or plant fossils.
  - **Class 5a** - Outcrop areas with very high potential are extensive (greater than two acres) and paleontological resources may be susceptible to adverse impacts from surface disturbing actions.
  - **Class 5b** - Areas underlain by geologic units with very high potential but have lowered risks of disturbance due to moderating circumstances such as a protective layer of soil or alluvial material; or outcrop areas are smaller than two contiguous acres.

It should be noted that many fossils, though common and unimpressive in and of themselves, can be important paleo-environmental, depositional, and chronostratigraphic indicators.

## LOCATION

Kerr McGee's proposed well pads, access roads, and pipelines for "NBU #920-12B, D, E, F, G, H, I, J & K; #920-13A, B & H" (Sec. 12 & 13, T 9 S, R 20 E) are located on Ute Indian Reservation land about 1 miles south of the White River and some 3.5 miles southeast of Ouray, Utah. The project area can be found on the Ouray SE 7.5 minute U. S. Geological Survey Quadrangle Map, Uintah County, Utah.

## PREVIOUS WORK

The basins of western North America have long produced some of the richest fossil collections in the world. Early Cenozoic sediments are especially well represented throughout the western interior. Paleontologists started field work in Utah's Uinta Basin as early as 1870 (Betts, 1871; Marsh, 1871, 1875a, 1875b). The Uinta Basin is located in the northeastern corner of Utah and covers approximately 31,000 sq. km (12,000 sq. miles) ranging in elevation from 1,465 to 2,130 m (4,800 to 7,000 ft) (Marsell, 1964; Hamblin et al., 1987). Middle to late Eocene time marked a period of dramatic change in the climate, flora, (Stucky, 1992) and fauna (Black and Dawson, 1966) of North America.

## GEOLOGICAL AND PALEONTOLOGICAL OVERVIEW

Early in the geologic history of Utah, some 1,000 to 600 Ma, an east-west trending basin developed creating accommodation for 25,000 feet of siliclastics. Uplift of that filled-basin during the early Cenozoic formed the Uinta Mountains (Rasmussen et al., 1999). With the rise of the Uinta Mountains the asymmetrical synclinal Uinta Basin is thought to have formed through the effects of down warping in connection with the uplift. Throughout the Paleozoic and Mesozoic deposition fluctuated between marine and non-marine environments laying down a thick succession of sediments in the area now occupied by the Uinta Basin. Portions of these beds crop out on the margins of the basin due to tectonic events during the late Mesozoic.

Early Tertiary Uinta Basin sediments were deposited in alternating lacustrine and fluvial environments. Large shallow lakes periodically covered most of the basin and surrounding areas during early to mid Eocene time (Abbott, 1957). These lacustrine sediments show up in the western part of the basin, dipping 2-3 degrees to the northeast and are lost in the subsurface on the east side. The increase of cross-bedded, coarse-grained sandstone and conglomerates preserved in paleo-channels indicates a transition to a fluvial environment toward the end of the epoch.

Four Eocene formations are recognized in the Uinta Basin: the Wasatch, Green River, Uinta and Duchesne River, respectively (Wood, 1941). The Uinta Formation is subdivided into two lithostratigraphic units namely: the Wagonhound Member (Wood, 1934), formerly known as Uinta A and B (Osborn, 1895, 1929) and the Myton Member previously regarded as the Uinta C.

Within the Uinta Basin in northeast Utah, the Uinta Formation in the western part of the basin is composed primarily of lacustrine sediments inter-fingering with over-bank deposits of silt, and mudstone and westward flowing channel sands and fluvial clays, muds, and sands in the east (Bryant et al, 1990; Ryder et al, 1976). Stratigraphic work done by early geologists and paleontologists within the Uinta Formation focused on the definition of rock units and attempted to define a distinction between early and late Uintan faunas (Riggs, 1912; Peterson and Kay, 1931; Kay 1934). More recent work focused on magnetostratigraphy, radioscopic chronology, and continental biostratigraphy (Flynn, 1986; Prothero, 1996). Well-known for its fossiliferous nature and distinctive mammalian fauna of mid-Eocene Age, the Uinta Formation is the type formation for the Uintan Land Mammal Age (Wood et al, 1941).

The Duchesne River Formation of the Uinta Basin in northeastern Utah is composed of a succession of fluvial and flood plain deposits composed of mud, silt, and sandstone. The source area for these late Eocene deposits is from the Uinta Mountains indicated by paleocurrent data (Anderson and Picard, 1972). In Peterson's (1931c) paper, the name "Duchesne Formation" was applied to the formation and it was later changed to the "Duchesne River Formation" by Kay (1934). The formation is divided up into four members: the Brennan Basin, Dry Gulch Creek, LaPoint, and Starr Flat (Anderson and Picard, 1972). Debates concerning the Duchesne River Formation, as to whether its age was late Eocene or early Oligocene, have surfaced throughout the literature of the last century (Wood et al., 1941; Scott 1945). Recent paleo-magnetostratigraphic work (Prothero, 1996) shows that the Duchesne River Formation is late Eocene in time.

## FIELD METHODS

In order to determine if the proposed project area contained any paleontological resources, a reconnaissance survey was performed. An on-site observation of the proposed areas undergoing surficial disturbance is necessary because judgments made from topographic maps alone are often unreliable. Areas of low relief have potential to be erosional surfaces with the possibility of bearing fossil materials rather than surfaces covered by unconsolidated sediment or soils.

When found within the proposed construction areas, outcrops and erosional surfaces were checked to determine if fossils were present and to assess needs. Careful effort is made during surveys to identify and evaluate significant fossil materials or fossil horizons when they are found. Microvertebrates, although rare, are occasionally found in anthills or upon erosional surfaces and are of particular importance.

## PROJECT AREA

The project area is situated in the Wagonhound Member (Uinta A & B) of the Uinta Formation. The following list provides a description of the individual wells and their associated pipelines and access roads.

### NBU #920-12B

The proposed access road and pipeline travel approximately 500 ft west until they meet the proposed well pad for “NBU 920-12B” in the NW/NE quarter-quarter section of Sec. 12, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline and well pad are staked on sloping ground covered by colluvium, outcrops of purple sandstone composed of subrounded, medium to coarse grains, and outcrops of light gray sandstone composed of subrounded, medium grains. The purple sandstone outcrops were observed approximately 20 ft south from the proposed pipeline and the light gray outcrops were observed approximately 10 ft west of the center stake. Isolated fragments of *Echmatemys* carapace and plastron were found around the purple sandstone.

### NBU #920-12D

The proposed access road travels east where it meets the proposed well pad for “NBU 920-12D” in the NW/NW quarter-quarter section of Sec. 12, T 9 S, R 20 E (Figure 1). The proposed access road and well pad are staked on relatively flat ground covered almost entirely by eolian wind deposits. Although the ground is mostly covered in eolian blown sand, there was an outcrop of light brown sandstone composed of subrounded, medium grains approximately 10 feet east from the center stake. Isolated pieces of turtle carapace and plastron belonging to *Echmatemys* and pieces of a mammalian skull with enamel shards were found scattered around the sandstone, and a partial *Echmatemys* specimen was found *in-situ*.



**NBU #920-12E**

The proposed access road and pipeline travel east approximately 500 ft until meeting the proposed well pad for ‘NBU 920-12E’ in the SW/NW quarter-quarter section of Sec. 12, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on sloping ground that is covered by colluvium, reworked washout deposits, and large outcrops of purple sandstone composed of subrounded, medium to coarse grains. Fossils found in the area consisted of isolated pieces of carapace and plastron belonging to *Echmatemys* and a large bone fragment (brontothere?).

**NBU #920-12F**

The proposed access road and pipeline travel west approximately 500 ft from the existing road until they meet the proposed well pad for “NBU 920-12F” in the SE/NW quarter-quarter section of Sec. 12, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on relatively flat ground covered with colluvium and reworked washout deposits. No fossils were found.

**NBU #920-12G**

The proposed access road and pipeline travel west approximately 1,500 ft from the existing road until they meet the proposed well pad in the SW/NE quarter-quarter section of Sec. 12, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on relatively flat ground covered with colluvium and reworked washout deposits. No fossils were found.

**NBU #920-12H**

The proposed access road and pipeline travel approximately 500 ft southeast until they meet the proposed well pad for “NBU 920-12H” in the SE/NE quarter-quarter section of Sec. 12, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on sloping ground covered by colluvium and outcrops of purple sandstone composed of subrounded, medium grains. The purple sandstone outcrop was observed approximately 30 ft from south from the center stake, and 20 ft east of the proposed pipeline. Fossils found in the area included isolated fragments of *Echmatemys* carapace and plastron.

**NBU #920-12I**

The proposed access road and pipeline travel approximately 2,000 ft east until they meet with the proposed well pad “NBU 920-12I” in the NE/SE quarter-quarter section of Sec. 12, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on sloping ground covered by colluvium and outcrops of purple sandstone composed of subrounded, medium grains that are approximately 20 ft south of the proposed pipeline and well pad. Isolated fragments of turtle carapace and plastron belonging to *Echmatemys* were found around the sandstone and four highly weathered vertebrae possibly belonging to the suborder serpentes were found approximately 10 ft from the center stake.

**NBU #920-12J**

The proposed access road and pipeline branch off from the proposed access road and pipeline to “NBU 920-12I” and travel north to proposed well pad “NBU 920-12J” in the NW/SE quarter-quarter section of Sec. 12, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on sloping ground covered by colluvium and an outcrop of purple sandstone composed subrounded, medium grains. The outcrop of sandstone lies approximately 20 ft south from the proposed pipeline and well pad. Isolated fragments of *Echmatemys* carapace and plastron were found around the sandstone.

**NBU #920-12K**

The proposed access road and pipeline branch off the proposed access road and pipeline for “NBU 920-12I” and travel north to proposed well pad “NBU 920-12K” in the NE/SW quarter-quarter section of Sec. 12, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on sloping ground that is covered by colluvium and out crops of purple sandstone composed of subrounded, medium grains. The outcrop of sandstone lies approximately 20 ft south from the proposed pipeline and well pad. Isolated fragments of *Echmatemys* carapace and plastron were found around the sandstone.

**NBU #920-13A**

The proposed access road and pipeline travel east from the existing road until they meet the proposed well pad for “NBU 920-13A” in the NW/NE quarter-quarter section of Sec. 13, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on relatively flat ground covered by colluvium and purple outcrops of sandstone composed of subrounded, medium grains. The outcrops of purple sandstone were observed approximately 20 ft southeast of the central stake. Fossils found included several fragments of *Echmatemys* that were loosely associated to each other.

**NBU #920-13B**

The proposed access road and pipeline travel southwest from the existing road until they meet the proposed well pad for “NBU 920-13B” in the NW/NE quarter-quarter section of Sec. 13, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on relatively flat ground covered by colluvium and outcrops of purple sandstone composed of subrounded, medium grains. The outcrop of sandstone was observed approximately 20 ft west and 30 ft south from the well pad. Fossils found in the area included isolated fragments of *Echmatemys* carapace and plastron.

**NBU #920-13H**

The proposed access road and pipeline travel west from the existing road until they meet the proposed well pad for “NBU 920-13H” in the SE/NE quarter-quarter section of Sec. 13, T 9 S, R 20 E (Figure 1). The proposed access road, pipeline, and well pad are staked on flat ground that is covered by colluvium. No fossils were found.

**SURVEY RESULTS**

<b>PROJECT</b>	<b>GEOLOGY</b>	<b>PALEONTOLOGY</b>
<b>“NBU #920-12B”</b> (Sec. 12, T 9 S, R 20, E)	The proposed access road, pipeline and well pad are staked on sloping ground covered by colluvium, outcrops of purple sandstone composed of subrounded, medium to coarse grains, and outcrops of light gray sandstone composed of subrounded, medium grains. The purple sandstone outcrops were observed approximately 20 ft south from the proposed pipeline and the light gray outcrops were observed approximately 10 ft west of the center stake.	Isolated fragments of <i>Echmatemys</i> carapace and plastron were found around the purple sandstone. <b>Class 3a</b>
<b>“NBU #920-12D”</b> (Sec. 12, T 9 S, R 20, E)	The proposed access road and well pad are staked on relatively flat ground covered almost entirely by eolian wind deposits. Although the ground is mostly covered in eolian blown sand, there was an outcrop of light brown sandstone composed of subrounded, medium grains approximately 10 feet east from the center stake.	Isolated pieces of turtle carapace and plastron belonging to <i>Echmatemys</i> and pieces of a mammalian skull with enamel shards were found scattered around the sandstone, and a partial <i>Echmatemys</i> specimen was found <i>in-situ</i> . <b>Class 4a</b>
<b>“NBU #920-12E”</b> (Sec. 12, T 9 S, R 20, E)	The proposed access road, pipeline, and well pad are staked on sloping ground that is covered by colluvium, reworked washout deposits, and large outcrops of purple sandstone composed of subrounded, medium to coarse grains.	Fossils found in the area consisted of isolated pieces of carapace and plastron belonging to <i>Echmatemys</i> and a large bone fragment (brontothere?). <b>Class 4a</b>
<b>“NBU #920-12F”</b> (Sec. 12, T 9 S, R 20, E)	The proposed access road, pipeline, and well pad are staked on relatively flat ground covered with colluvium and reworked washout deposits.	No fossils were found. <b>Class 3a</b>
<b>“NBU #920-12G”</b> (Sec. 12, T 9 S, R 20, E)	The proposed access road, pipeline, and well pad are staked on relatively flat ground covered with colluvium and reworked washout deposits.	No fossils were found. <b>Class 3a</b>
<b>“NBU #920-12H”</b> (Sec. 12, T 9 S, R 20, E)	The proposed access road, pipeline, and well pad are staked on sloping ground covered by colluvium and outcrops of purple sandstone composed of subrounded, medium grains. The purple sandstone outcrop was observed approximately 30 ft from south from the center stake, and 20 ft east of the proposed pipeline.	Fossils found in the area included isolated fragments of <i>Echmatemys</i> carapace and plastron. <b>Class 4a</b>

<p><b>“NBU #920-12I”</b> (Sec. 12, T 9 S, R 20, E)</p>	<p>The proposed access road, pipeline, and well pad are staked on sloping ground covered by colluvium and outcrops of purple sandstone composed of subrounded, medium grains that are approximately 20 ft south of the proposed pipeline and well pad.</p>	<p>Isolated fragments of turtle carapace and plastron belonging to <i>Echmatemys</i> were found around the sandstone and four highly weathered vertebrae possibly belonging to the suborder serpentes were found approximately 10 ft from the center stake. <b>Class 4a</b></p>
<p><b>“NBU #920-12J”</b> (Sec. 12, T 9 S, R 20, E)</p>	<p>The proposed access road, pipeline, and well pad are staked on sloping ground covered by colluvium and an outcrop of purple sandstone composed subrounded, medium grains. The outcrop of sandstone lies approximately 20 ft south from the proposed pipeline and well pad.</p>	<p>Isolated fragments of <i>Echmatemys</i> carapace and plastron were found around the sandstone. <b>Class 3a</b></p>
<p><b>“NBU #920-12K”</b> (Sec. 12, T 9 S, R 20, E)</p>	<p>The proposed access road, pipeline, and well pad are staked on sloping ground that is covered by colluvium and out crops of purple sandstone composed of subrounded, medium grains. The outcrop of sandstone lies approximately 20 ft south from the proposed pipeline and well pad.</p>	<p>Isolated fragments of <i>Echmatemys</i> carapace and plastron were found around the sandstone. <b>Class 3a</b></p>
<p><b>“NBU #920-13A”</b> (Sec. 13, T 9 S, R 20, E)</p>	<p>The proposed access road, pipeline, and well pad are staked on relatively flat ground covered by colluvium and purple outcrops of sandstone composed of subrounded, medium grains. The outcrops of purple sandstone were observed approximately 20 ft southeast of the central stake.</p>	<p>Fossils found included several fragments of <i>Echmatemys</i> that were loosely associated to each other. <b>Class 3a</b></p>
<p><b>“NBU #920-13B”</b> (Sec. 13, T 9 S, R 20, E)</p>	<p>The proposed access road, pipeline, and well pad are staked on relatively flat ground covered by colluvium and outcrops of purple sandstone composed of subrounded, medium grains. The outcrop of sandstone was observed approximately 20 ft west and 30 ft south from the well pad.</p>	<p>Fossils found in the area included isolated fragments of <i>Echmatemys</i> carapace and plastron. <b>Class 3a</b></p>
<p><b>“NBU #920-13H”</b> (Sec. 13, T 9 S, R 20, E)</p>	<p>The proposed access road, pipeline, and well pad are staked on flat ground that is covered by colluvium.</p>	<p>No fossils were found. <b>Class 3a</b></p>

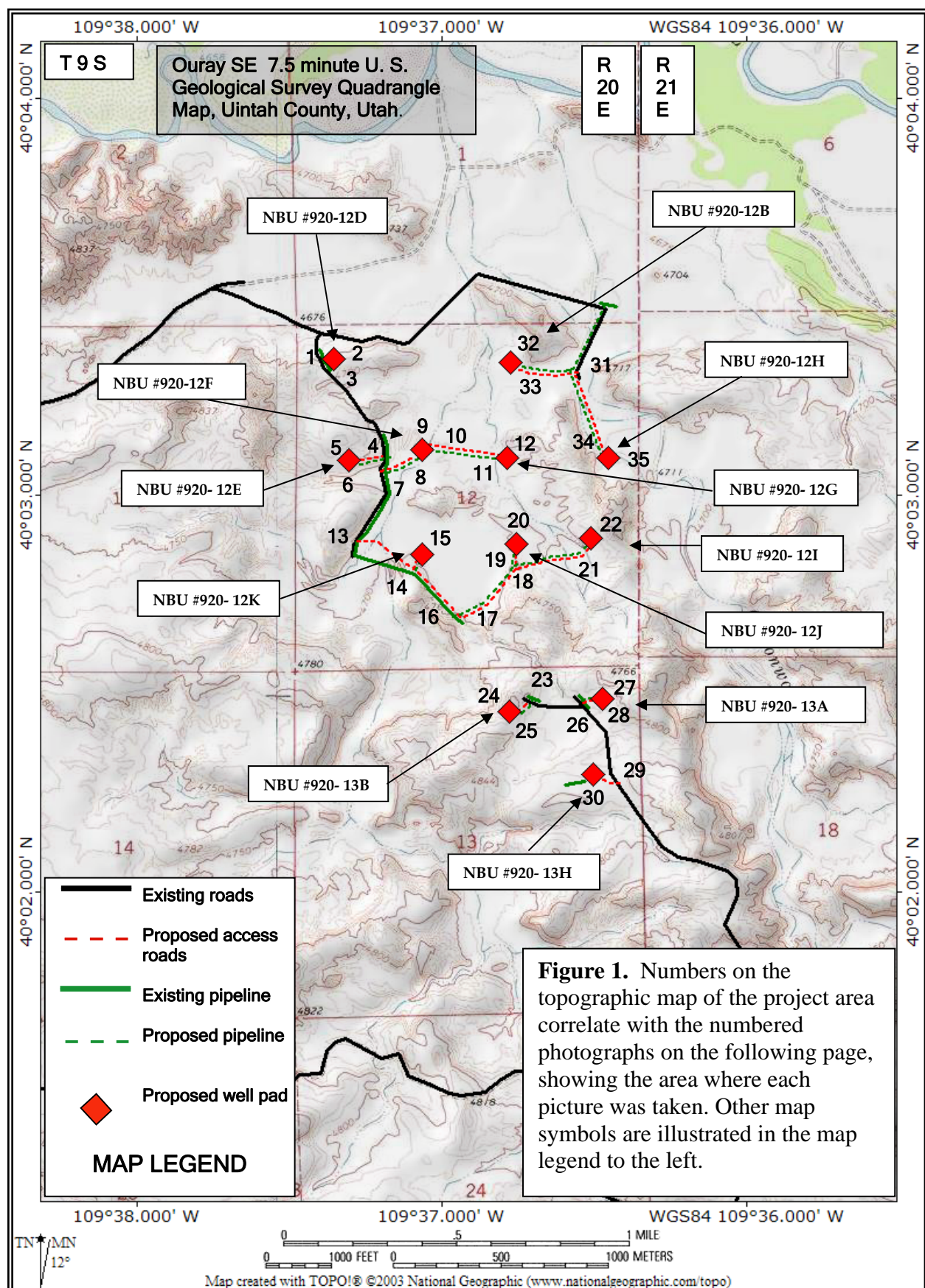
## RECOMMENDATIONS

A reconnaissance survey was conducted for Kerr McGee's proposed well pads, access roads, and pipelines for "NBU #920-12B, D, E, F, G, H, I, J & K; #920-13A, B & H" (Sec. 12 & 13, T 9 S, R 20 E) The well pads and the associated access roads and pipelines covered in this report showed some signs of vertebrate fossils, therefore, we advise the following recommendations

**Due to the number of fossil vertebrates found, we recommend that a permitted paleontologist be present to monitor the construction of the proposed access roads, pipelines, and well pads "NBU #920-12D, NBU #920-12E, and NBU #920-12I" (Sec. 12, T 9 S, R 20 E)**

We further recommended that the remaining access roads, pipelines and well pads covered in this report have no paleontological restriction placed on them during construction. **However, buried pipeline will encounter Uinta formation sediments along most of the staked pipeline corridors and care should be taken to report any vertebrate fossils which are disturbed.**

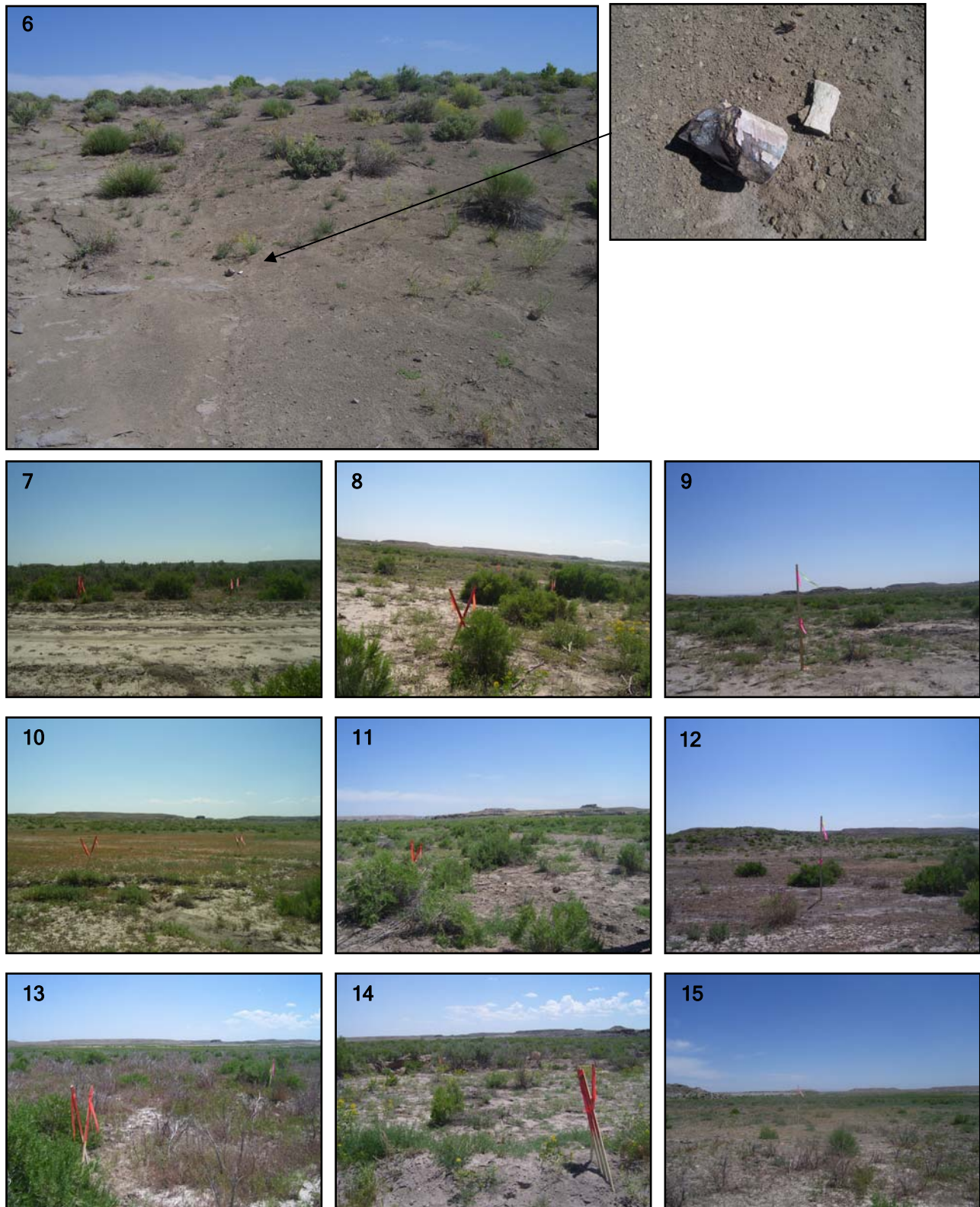
Nevertheless, if any vertebrate fossil(s) are found during construction within the project area, recommendations are that a paleontologist is immediately notified in order to collect fossil materials in danger of being destroyed. Any vertebrate fossils found should be carefully moved outside of the construction areas to be checked by a permitted paleontologist.





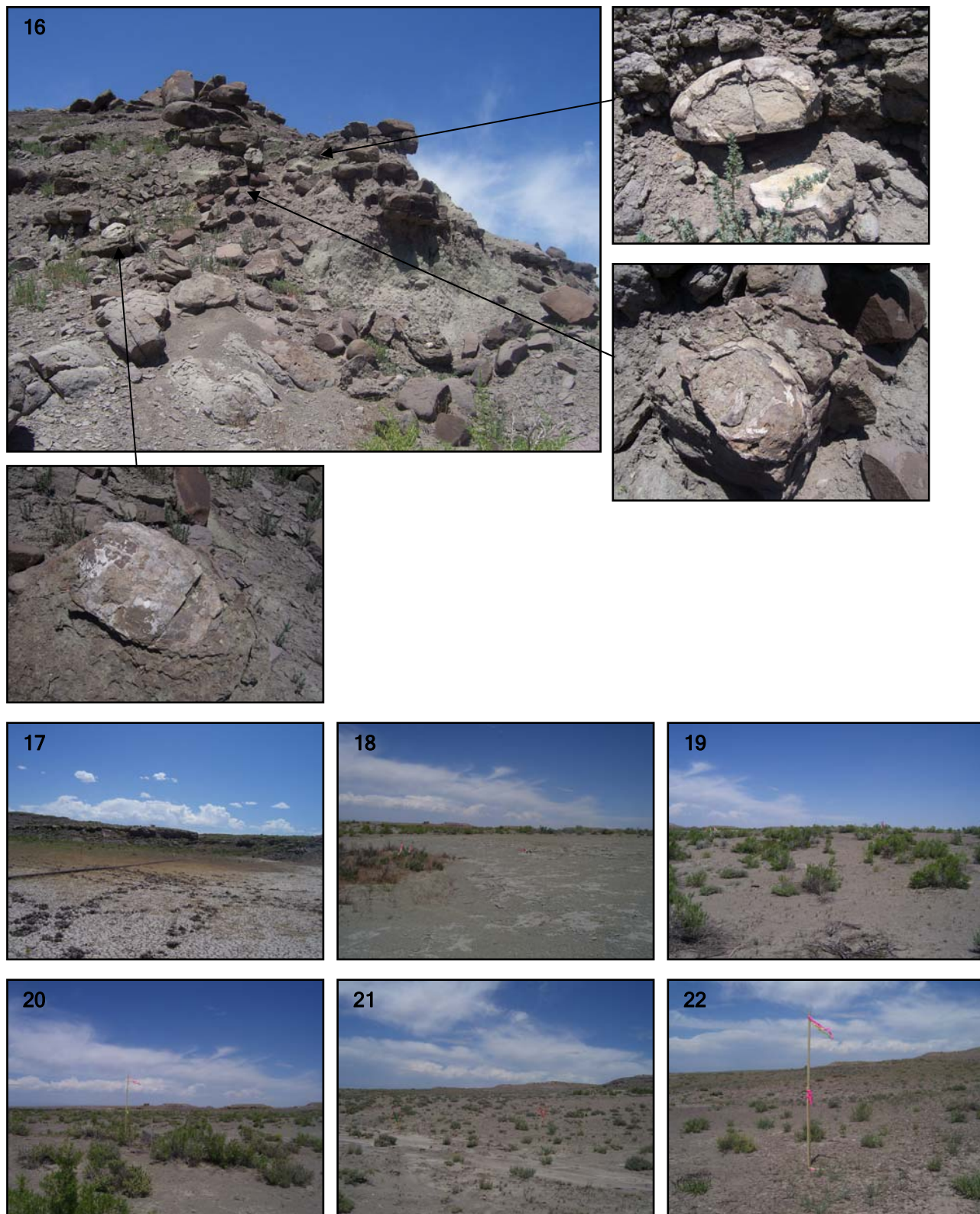
**Figure 1.** *continued...*



**Figure 1.** *continued...*

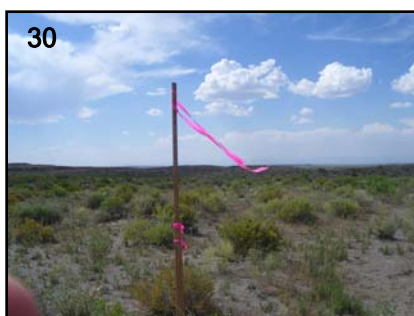


**Figure 1.** *continued...*

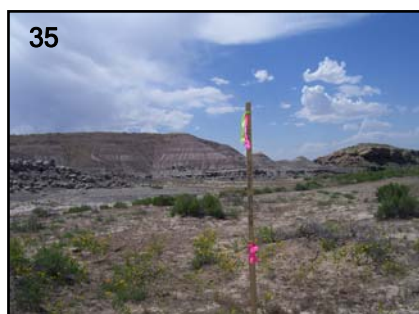




**Figure 1.** *continued...*



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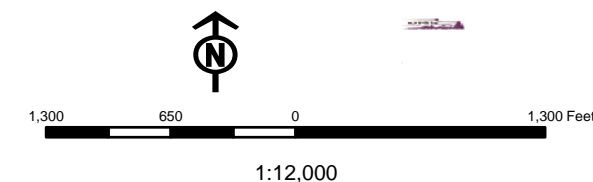
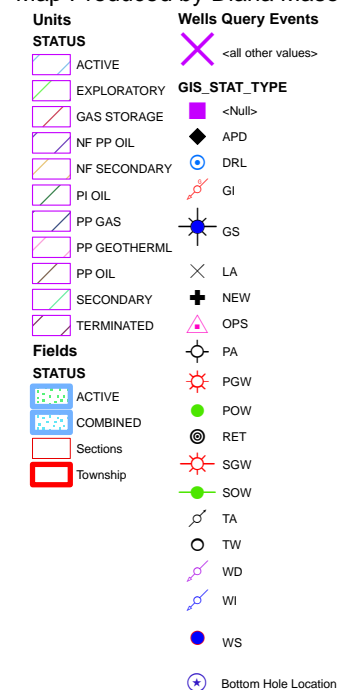
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Units	Wells Query Events
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# United States Department of the Interior

## BUREAU OF LAND MANAGEMENT

Utah State Office  
P.O. Box 45155  
Salt Lake City, Utah 84145-0155

**IN REPLY REFER TO:****3160****(UT-922)**

September 25, 2008

**Memorandum**

To: Assistant District Manager Minerals, Vernal District

From: Michael Coulthard, Petroleum Engineer

Subject: 2008 Plan of Development Natural Buttes Unit Uintah  
County, Utah.

Pursuant to email between Diana Whitney, Division of Oil, Gas and Mining, and Mickey Coulthard, Utah State Office, Bureau of Land Management, the following wells are planned for calendar year 2008 within the Natural Buttes Unit, Uintah County, Utah.

API #	WELL NAME	LOCATION
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(Proposed PZ WASATCH-MESA VERDE)

43-047-50148	NBU 920-24P Sec 24 T09S R20E 0992 FSL 0462 FEL	
43-047-50149	NBU 921-12AT Sec 12 T09S R21E 0643 FNL 0670 FEL	
43-047-50147	NBU 920-24L Sec 24 T09S R20E 2519 FSL 0698 FWL	
43-047-50146	NBU 920-24I Sec 24 T09S R20E 1983 FSL 0829 FEL	

(Proposed PZ MESA VERDE)

43-047-50145	NBU 920-14D Sec 14 T09S R20E 0590 FNL 0835 FWL	
43-047-50144	NBU 920-13I Sec 13 T09S R20E 2095 FSL 0549 FEL	
43-047-50143	NBU 920-13J Sec 13 T09S R20E 1884 FSL 2217 FEL	
43-047-50150	NBU 920-13H Sec 13 T09S R20E 1786 FNL 0658 FEL	
43-047-50152	NBU 920-13B Sec 13 T09S R20E 0925 FNL 1555 FEL	
43-047-50153	NBU 920-12P Sec 12 T09S R20E 0659 FSL 0471 FEL	
43-047-40368	NBU 921-12DT Sec 12 T09S R21E 0905 FNL 0671 FWL	

This office has no objection to permitting the wells at this time.

/s/ Michael L. Coulthard

bcc: File – Natural Buttes Unit  
Division of Oil Gas and Mining  
Central Files  
Agr. Sec. Chron  
Fluid Chron

MCoulthard:mc:9-25-08



# WORKSHEET

## APPLICATION FOR PERMIT TO DRILL

**APD RECEIVED:** 9/23/2008

**API NO. ASSIGNED:** 43047501520000

**WELL NAME:** NBU 920-13B

**OPERATOR:** KERR-MCGEE OIL & GAS ONSHORE, L.P. (N2995)

**PHONE NUMBER:** 720 929-6226

**CONTACT:** Kevin McIntyre

**PROPOSED LOCATION:** NWNE 13 090S 200E

**Permit Tech Review:** ☒

**SURFACE:** 0925 FNL 1555 FEL

**Engineering Review:** ☐

**BOTTOM:** 0925 FNL 1555 FEL

**Geology Review:** ☒

**COUNTY:** UINTAH

**LATITUDE:** 40.04029

**LONGITUDE:** -109.61070

**UTM SURF EASTINGS:** 618525.00

**NORTHINGS:** 4432943.00

**FIELD NAME:** NATURAL BUTTES

**LEASE TYPE:** 1 - Federal

**LEASE NUMBER:** UTU-0579

**PROPOSED FORMATION:** MVRD

**SURFACE OWNER:** 2 - Indian

**COALBED METHANE:** NO

### RECEIVED AND/OR REVIEWED:

- ☒ **PLAT**
- ☒ **Bond:** FEDERAL - WYB000291
- ☐ **Potash**
- ☒ **Oil Shale 190-5**
- ☐ **Oil Shale 190-3**
- ☐ **Oil Shale 190-13**
- ☒ **Water Permit:** Permit #43-8496
- ☐ **RDCC Review:**
- ☐ **Fee Surface Agreement**
- ☐ **Intent to Commingle**

### LOCATION AND SITING:

- ☐ **R649-2-3.**
- Unit:** NATURAL BUTTES
- ☐ **R649-3-2. General**
- ☐ **R649-3-3. Exception**
- ☒ **Drilling Unit**
- Board Cause No:** 173-14
- Effective Date:** 12/2/1999
- Siting:** 460' fr u bdry & uncomm. tract
- ☐ **R649-3-11. Directional Drill**

**Comments:** Presite Completed

**Stipulations:** 4 - Federal Approval - dmason  
17 - Oil Shale 190-5(b) - dmason



JON M. HUNTSMAN, JR.  
*Governor*

GARY R. HERBERT  
*Lieutenant Governor*

## State of Utah

DEPARTMENT OF NATURAL RESOURCES

MICHAEL R. STYLER  
*Executive Director*

Division of Oil, Gas and Mining

JOHN R. BAZA  
*Division Director*

### Permit To Drill

\*\*\*\*\*

**Well Name:** NBU 920-13B  
**API Well Number:** 43047501520000  
**Lease Number:** UTU-0579  
**Surface Owner:** INDIAN  
**Approval Date:** 9/25/2008

**Issued to:**

KERR-MCGEE OIL & GAS ONSHORE, L.P. , P.O. Box 173779, Denver, CO 80217

**Authority:**

Pursuant to Utah Code Ann. §40-6-1 et seq., and Utah Administrative Code R649-3-1 et seq., the Utah Division of Oil, Gas and Mining issues conditions of approval, and permit to drill the listed well. This permit is issued in accordance with the requirements of CAUSE: 173-14.

**Duration:**

This approval shall expire one year from the above date unless substantial and continuous operation is underway, or a request for extension is made prior to the expiration date

**General:**

Compliance with the requirements of Utah Admin. R. 649-1 et seq., the Oil and Gas Conservation General Rules, and the applicable terms and provisions of the approved Application for permit to drill.

**Conditions of Approval:**

State approval of this well does not supercede the required federal approval, which must be obtained prior to drilling.

In accordance with the Order in Cause No. 190-5(b) dated October 28, 1982, the operator shall comply with the requirements of Rules R649-3-31 and R649-3-27 pertaining to Designated Oil Shale Areas. Additionally, the operators shall ensure that the surface and or production casing is properly cemented over the entire oil shale section as defined by Rule R649-3-31. The Operator shall report the actual depth the oil shale is encountered to the division.

**Notification Requirements:**

Notify the Division with 24 hours of spudding the well.

- Contact Carol Daniels at (801) 538-5284.

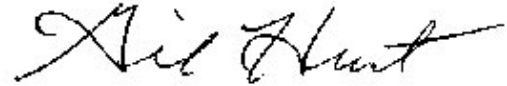
Notify the Division prior to commencing operations to plug and abandon the well.

- Contact Dustin Doucet at (801) 538-5281 office (801) 733-0983 home

**Reporting Requirements:**

All required reports, forms and submittals will be promptly filed with the Division, including but not limited to the Entity Action Form (Form 6), Report of Water Encountered During Drilling (Form 7), Weekly Progress Reports for drilling and completion operations, and Sundry Notices and Reports on Wells requesting approval of change of plans or other operational actions.

**Approved By:**

A handwritten signature in black ink, appearing to read "Gil Hunt", with a stylized, cursive script.

Gil Hunt  
Associate Director, Oil & Gas

<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>			
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579			
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> Ute			
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES			
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B			
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000			
<b>PHONE NUMBER:</b> 720 929-6007 Ext		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES			
<b>COUNTY:</b> UINTAH		<b>STATE:</b> UTAH			
<b>11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA</b>					
<b>TYPE OF SUBMISSION</b>	<b>TYPE OF ACTION</b>				
<input checked="" type="checkbox"/> <b>NOTICE OF INTENT</b> Approximate date work will start: 9/28/2009  <input type="checkbox"/> <b>SUBSEQUENT REPORT</b> Date of Work Completion:  <input type="checkbox"/> <b>SPUD REPORT</b> Date of Spud:  <input type="checkbox"/> <b>DRILLING REPORT</b> Report Date:	<table style="width: 100%; border: none;"> <tr> <td style="width: 33%; vertical-align: top;"> <input type="checkbox"/> ACIDIZE  <input type="checkbox"/> CHANGE TO PREVIOUS PLANS  <input type="checkbox"/> CHANGE WELL STATUS  <input type="checkbox"/> DEEPEN  <input type="checkbox"/> OPERATOR CHANGE  <input type="checkbox"/> PRODUCTION START OR RESUME  <input type="checkbox"/> REPERFORATE CURRENT FORMATION  <input type="checkbox"/> TUBING REPAIR  <input type="checkbox"/> WATER SHUTOFF  <input type="checkbox"/> WILDCAT WELL DETERMINATION         </td> <td style="width: 33%; vertical-align: top;"> <input type="checkbox"/> ALTER CASING  <input type="checkbox"/> CHANGE TUBING  <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS  <input type="checkbox"/> FRACTURE TREAT  <input type="checkbox"/> PLUG AND ABANDON  <input type="checkbox"/> RECLAMATION OF WELL SITE  <input type="checkbox"/> SIDETRACK TO REPAIR WELL  <input type="checkbox"/> VENT OR FLARE  <input type="checkbox"/> SI TA STATUS EXTENSION  <input type="checkbox"/> OTHER         </td> <td style="width: 33%; vertical-align: top;"> <input type="checkbox"/> CASING REPAIR  <input type="checkbox"/> CHANGE WELL NAME  <input type="checkbox"/> CONVERT WELL TYPE  <input type="checkbox"/> NEW CONSTRUCTION  <input type="checkbox"/> PLUG BACK  <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION  <input type="checkbox"/> TEMPORARY ABANDON  <input type="checkbox"/> WATER DISPOSAL  <input checked="" type="checkbox"/> APD EXTENSION          OTHER:       </td> </tr> </table>		<input type="checkbox"/> ACIDIZE <input type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> DEEPEN <input type="checkbox"/> OPERATOR CHANGE <input type="checkbox"/> PRODUCTION START OR RESUME <input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> WATER SHUTOFF <input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> ALTER CASING <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> SI TA STATUS EXTENSION <input type="checkbox"/> OTHER	<input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CONVERT WELL TYPE <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> PLUG BACK <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION <input type="checkbox"/> TEMPORARY ABANDON <input type="checkbox"/> WATER DISPOSAL <input checked="" type="checkbox"/> APD EXTENSION OTHER:
<input type="checkbox"/> ACIDIZE <input type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> DEEPEN <input type="checkbox"/> OPERATOR CHANGE <input type="checkbox"/> PRODUCTION START OR RESUME <input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> WATER SHUTOFF <input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> ALTER CASING <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> SI TA STATUS EXTENSION <input type="checkbox"/> OTHER	<input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CONVERT WELL TYPE <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> PLUG BACK <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION <input type="checkbox"/> TEMPORARY ABANDON <input type="checkbox"/> WATER DISPOSAL <input checked="" type="checkbox"/> APD EXTENSION OTHER:			
<b>12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.</b> Kerr-McGee Oil & Gas Onshore, L.P. (Kerr-McGee) respectfully requests an extension to this APD for the maximum time allowed. Please contact the undersigned with any questions and/or comments. Thank you.					
<div style="text-align: right;"> <b>Approved by the Utah Division of Oil, Gas and Mining</b> </div>		<b>Date:</b> <u>September 30, 2009</u>  <b>By:</b>			
<b>NAME (PLEASE PRINT)</b> Danielle Piernot		<b>PHONE NUMBER</b> 720 929-6156			
<b>SIGNATURE</b> N/A		<b>TITLE</b> Regulatory Analyst			
<b>DATE</b> 9/24/2009					





**The Utah Division of Oil, Gas, and Mining**

- State of Utah
- Department of Natural Resources

**Electronic Permitting System - Sundry Notices**

**Request for Permit Extension Validation Well Number 43047501520000**

**API:** 43047501520000

**Well Name:** NBU 920-13B

**Location:** 0925 FNL 1555 FEL QTR NWE SEC 13 TWNP 090S RNG 200E MER S

**Company Permit Issued to:** KERR-MCGEE OIL & GAS ONSHORE, L.P.

**Date Original Permit Issued:** 9/29/2008

The undersigned as owner with legal rights to drill on the property as permitted above, hereby verifies that the information as submitted in the previously approved application to drill, remains valid and does not require revision. Following is a checklist of some items related to the application, which should be verified.

- If located on private land, has the ownership changed, if so, has the surface agreement been updated? ☐ Yes ☒ No
- Have any wells been drilled in the vicinity of the proposed well which would affect the spacing or siting requirements for this location? ☐ Yes ☒ No
- Has there been any unit or other agreements put in place that could affect the permitting or operation of this proposed well? ☐ Yes ☒ No
- Have there been any changes to the access route including ownership, or rightof- way, which could affect the proposed location? ☐ Yes ☒ No
- Has the approved source of water for drilling changed? ☐ Yes ☒ No
- Have there been any physical changes to the surface location or access route which will require a change in plans from what was discussed at the onsite evaluation? ☐ Yes ☒ No
- Is bonding still in place, which covers this proposed well? ☒ Yes ☐ No

**Approved by the  
Utah Division of  
Oil, Gas and Mining**

**Signature:** Danielle Piernot

**Date:** 9/24/2009

**Title:** Regulatory Analyst **Representing:** KERR-MCGEE OIL & GAS ONSHORE, L.P.

**Date:** September 30, 2009

**By:**

**RECEIVED** September 24, 2009

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

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VERNAL FIELD OFFICE

FORM APPROVED  
OMB No. 1004-0137  
Expires July 31, 2010

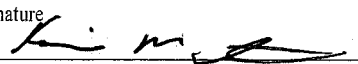
APPLICATION FOR PERMIT TO DRILL OR REENTER

1a. Type of work: <input checked="" type="checkbox"/> DRILL <input type="checkbox"/> REENTER		5. Lease Serial No. UTU-0579
1b. Type of Well: <input type="checkbox"/> Oil Well <input checked="" type="checkbox"/> Gas Well <input type="checkbox"/> Other <input checked="" type="checkbox"/> Single Zone <input type="checkbox"/> Multiple Zone		6. Indian, Allottee or Tribe Name Ute Tribe
2. Name of Operator Kerr-McGee Oil & Gas Onshore, LP		7. Unit or CA Agreement, Name and No. 890089000A
3a. Address P.O. Box 173779, Denver, CO 80217-3779	3b. Phone No. (include area code) 720.929.6226	8. Lease Name and Well No. NBU 920-13B
4. Location of Well (Report location clearly and in accordance with any State requirements. *) At surface NWNE 925' FNL & 1555' FEL LAT 40.04033 LON -109.61071 (NAD 27) At proposed prod. zone N/A		9. API Well No. 43 047 50152
14. Distance in miles and direction from nearest town or post office* 10.7 miles northwest of Ouray, Utah		10. Field and Pool, or Exploratory Natural Buttes Field
15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any) 925'	16. No. of acres in lease 1920	11. Sec., T. R. M. or Blk. and Survey or Area Sec. 13, T 9S, R 20E
18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft. 1000'	19. Proposed Depth 10,600'	12. County or Parish Uintah
21. Elevations (Show whether DF, KDB, RT, GL, etc.) 4,768.9' GL	22. Approximate date work will start*	13. State UT
23. Estimated duration 10 days		

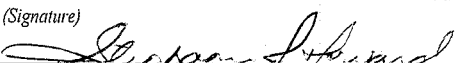
24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No.1, must be attached to this form:

1. Well plat certified by a registered surveyor.
2. A Drilling Plan.
3. A Surface Use Plan (if the location is on National Forest System Lands, the SUPO must be filed with the appropriate Forest Service Office).
4. Bond to cover the operations unless covered by an existing bond on file (see Item 20 above).
5. Operator certification
6. Such other site specific information and/or plans as may be required by the BLM.

25. Signature 	Name (Printed/Typed) Kevin McIntyre	Date 09/11/2008
--	--	--------------------

Title  
Regulatory Analyst I

Approved by (Signature) 	Name (Printed/Typed) Stephanie J. Howard	Date 12/15/09
--	---	------------------

Title  
Assistant Field Manager  
Lands & Mineral Resources

Office  
VERNAL FIELD OFFICE

Application approval does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Conditions of approval, if any, are attached. **CONDITIONS OF APPROVAL ATTACHED**

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

(Continued on page 2)

\*(Instructions on page 2)

NOS *and posted 1/14/08*  
AFMSS# 09SX50007A

NOTICE OF APPROVAL



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DIV. OF OIL, GAS & MINING

09SX50007A



UNITED STATES DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT  
VERNAL FIELD OFFICE

170 South 500 East

VERNAL, UT 84078

(435) 781-4400



**CONDITIONS OF APPROVAL FOR APPLICATION FOR PERMIT TO DRILL**

Company: Kerr McGee Oil & Gas Onshore, LP      Location: NWNE, Sec. 13, T9S, R20E  
Well No: NBU 920-13B      Lease No: UTU-0579  
API No: 43-047-5015X2      Agreement: Natural Buttes Unit

OFFICE NUMBER: (435) 781-4400

OFFICE FAX NUMBER: (435) 781-3420

**A COPY OF THESE CONDITIONS SHALL BE FURNISHED TO YOUR  
FIELD REPRESENTATIVE TO INSURE COMPLIANCE**

All lease and/or unit operations are to be conducted in such a manner that full compliance is made with the applicable laws, regulations (43 CFR Part 3160), and this approved Application for Permit to Drill including Surface and Downhole Conditions of Approval. The operator is considered fully responsible for the actions of his subcontractors. A copy of the approved APD must be on location during construction, drilling, and completion operations. **This permit is approved for a two (2) year period, or until lease expiration, whichever occurs first. An additional extension, up to two (2) years, may be applied for by sundry notice prior to expiration.**

**NOTIFICATION REQUIREMENTS**

Construction Activity (Notify Ute Tribe Energy & Minerals Dept. and BLM Environmental Scientist)	- The Ute Tribe Energy & Minerals Dept. and BLM Environmental Scientist shall be notified at least 48 hours in advance of any construction activity. The Ute Tribal office is open Monday through Thursday.
Construction Completion (Notify Ute Tribe Energy & Minerals Dept. and BLM Environmental Scientist)	- Upon completion of the pertinent APD/ROW construction, notify the Ute Tribe Energy & Minerals Dept. for a Tribal Technician to verify the Affidavit of Completion. Notify the BLM Environmental Scientist prior to moving on the drilling rig.
Spud Notice (Notify BLM Petroleum Engineer)	- Twenty-Four (24) hours prior to spudding the well.
Casing String & Cementing (Notify BLM Supv. Petroleum Tech.)	- Twenty-Four (24) hours prior to running casing and cementing all casing strings to: <a href="mailto:ut_vn_opreport@blm.gov">ut_vn_opreport@blm.gov</a> .
BOP & Related Equipment Tests (Notify BLM Supv. Petroleum Tech.)	- Twenty-Four (24) hours prior to initiating pressure tests.
First Production Notice (Notify BLM Petroleum Engineer)	- Within Five (5) business days after new well begins or production resumes after well has been off production for more than ninety (90) days.

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**SURFACE USE PROGRAM  
CONDITIONS OF APPROVAL (COAs)**

**Site-Specific Conditions of Approval:**

1. Paint New facilities "shadow gray."
2. Monitoring by a permitted paleontologist during the construction process.
3. Monitor location by a permitted archaeologist during the construction process.
4. Construct diversion ditches to surround well pad.
5. In accordance with the guidelines specified in the Utah BLM Field Office Guidelines for Raptor Protection from Human and Land Use Disturbances, 2002 (See Appendix D), a raptor survey shall be conducted prior to construction of the proposed location, pipeline, or access road if construction will take place during raptor nesting season (January 01 through September 30) and conduct its operations according to specification in the guidelines.
6. If project construction operation are scheduled to occur after June 11, 2010, KMG will conduct additional biological surveys in accordance with the guidelines specified I the USFWS Rare Plant Conservation Measures for Uinta Basin hookless cactus (See Appendix D) and conduct its operation according to its specifications.

**BIA Standard Conditions of Approval:**

1. Soil erosion will be mitigated by reseeding all disturbed areas.
2. The gathering pipelines will be constructed to lie on the surface. The surface pipelines will not be bladed or cleared of vegetation. Where pipelines are constructed parallel to roads they may be welded on the road and then lifted from the road onto the right-of-way. Where pipelines do not parallel roads but cross-country between sites, they shall be welded in place at well sites or on access roads and then pulled between stations with a suitable piece of equipment. Traffic will be restricted along these areas so that the pipeline right-of-way will not be used as an access road.
3. An open drilling system shall be used, unless otherwise specified in 10.0 Additional Stipulations of this document and in the Application for Permit to Drill. A closed drilling system shall be sued in all flood plain areas, and other highly sensitive areas, recommended by the Ute Tribe Technician, BIA, and other agencies involved.
4. The reserve pit shall be lined with a synthetic leak proof liner. After the drilling operation is complete, excess fluids shall be removed from the reserve pit and either hauled to an approved disposal site or shall be used to drill other wells. When the fluids are removed the pit shall be backfilled a minimum of 3.0' below the soil surface elevation.
5. A closed production system shall be used. This means all produced water and oil field fluid wastes shall be contained in leak proof tanks. These fluids shall be disposed of in either approved injection wells or disposal pits.
6. Major low water crossings will be armored with pit run material to protect them from erosion.
7. All personnel shall refrain from collecting any paleontological fossils and from disturbing any fossil resources in the area.
8. If fossils are exposed or identified during construction, all construction must cease and immediate notification to the Energy and Minerals Department and the Cultural Rights Protection Officer.

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9. Before the site is abandoned the company will be required to restore the right-of-way to near its original state. The disturbed area will be reseeded with desirable perennial vegetation. If necessary, the Bureau of Indian Affairs or Bureau of Land Management will provide a suitable seed mixture.
10. Noxious weeds will be controlled on all surface disturbances within the project area. If noxious weeds spread from the project area onto adjoining land, the company will also be responsible for their control.
11. If project construction operations are scheduled to occur after December 31, 2009, KMG shall conduct annual raptor surveys in accordance with the guidelines specified in the Utah Field Office Guidelines for Raptor Protection from Human and Land Use Disturbances, 2002 (See Appendix E) and conduct its operations according to applicable seasonal restrictions and spatial offsets.
12. USFWS threatened and endangered plant and animal conservation measures will be followed, as appropriate to the species identified by the biological resource survey (See Appendix E).
13. All personnel shall refrain from collecting artifacts and from disturbing any significant cultural resources in the area.
14. If artifacts or any culturally sensitive materials are exposed or identified during construction, all construction must cease and immediate notification to the Energy and Minerals Department and the Cultural Rights Protection Officer.

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**DOWNHOLE PROGRAM  
CONDITIONS OF APPROVAL (COAs)**

**SITE SPECIFIC DOWNHOLE COAs:**

- **Kerr McGee and their contractors shall strictly adhere to all operating practices in the SOP along with all Oil and Gas rules and requirements listed in the Code of Federal Regulations and all Federal Onshore Oil and Gas Orders except where variances have been granted.**

**All provisions outlined in Onshore Oil & Gas Order #2 Drilling Operations shall be strictly adhered to. The following items are emphasized:**

**DRILLING/COMPLETION/PRODUCING OPERATING STANDARDS**

- The spud date and time shall be reported orally to Vernal Field Office within 24 hours of spudding.
- Notify Vernal Field Office Supervisory Petroleum Engineering Technician at least 24 hours in advance of casing cementing operations and BOPE & casing pressure tests.
- All requirements listed in Onshore Order #2 III. E. Special Drilling Operations are applicable for air drilling of surface hole.
- Blowout prevention equipment (BOPE) shall remain in use until the well is completed or abandoned. Closing unit controls shall remain unobstructed and readily accessible at all times. Choke manifolds shall be located outside of the rig substructure.
- All BOPE components shall be inspected daily and those inspections shall be recorded in the daily drilling report. Components shall be operated and tested as required by Onshore Oil & Gas Order No. 2 to insure good mechanical working order. All BOPE pressure tests shall be performed by a test pump with a chart recorder and **NOT** by the rig pumps. Test shall be reported in the driller's log.
- BOP drills shall be initially conducted by each drilling crew within 24 hours of drilling out from under the surface casing and weekly thereafter as specified in Onshore Oil & Gas Order No. 2.
- Casing pressure tests are required before drilling out from under all casing strings set and cemented in place.
- No aggressive/fresh hard-banded drill pipe shall be used within casing.
- **Cement baskets shall not be run on surface casing.**

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- The operator must report all shows of water or water-bearing sands to the BLM. If flowing water is encountered it must be sampled, analyzed, and a copy of the analyses submitted to the BLM Vernal Field Office.
- The operator must report encounters of all non oil & gas mineral resources (such as Gilsonite, tar sands, oil shale, trona, etc.) to the Vernal Field Office, in writing, within 5 working days of each encounter. Each report shall include the well name/number, well location, date and depth (from KB or GL) of encounter, vertical footage of the encounter and, the name of the person making the report (along with a telephone number) should the BLM need to obtain additional information.
- A complete set of angular deviation and directional surveys of a directional well will be submitted to the Vernal BLM office engineer within 30 days of the completion of the well.
- While actively drilling, chronologic drilling progress reports shall be filed directly with the BLM, Vernal Field Office on a weekly basis in sundry, letter format or e-mail to the Petroleum Engineers until the well is completed.
- A cement bond log (CBL) will be run from the production casing shoe to the top of cement and shall be utilized to determine the bond quality for the production casing. Submit a field copy of the CBL to this office.
- **Please submit an electronic copy of all other logs run on this well in LAS format to UT\_VN\_Wellogs@BLM.gov. This submission will supersede the requirement for submittal of paper logs to the BLM.**
- There shall be no deviation from the proposed drilling, completion, and/or workover program as approved. Safe drilling and operating practices must be observed. Any changes in operation must have prior approval from the BLM Vernal Field Office.

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Well: NBU 920-13B  
12/17/2009

**OPERATING REQUIREMENT REMINDERS:**

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- All wells, whether drilling, producing, suspended, or abandoned, shall be identified in accordance with 43 CFR 3162.6. There shall be a sign or marker with the name of the operator, lease serial number, well number, and surveyed description of the well.
- In accordance with 43 CFR 3162.4-3, this well shall be reported on the "Monthly Report of Operations" (Oil and Gas Operations Report ((OGOR)) starting with the month in which operations commence and continue each month until the well is physically plugged and abandoned. This report shall be filed in duplicate, directly with the Minerals Management Service, P.O. Box 17110, Denver, Colorado 80217-0110, or call 1-800-525-7922 (303) 231-3650 for reporting information.
- Should the well be successfully completed for production, the BLM Vernal Field office must be notified when it is placed in a producing status. Such notification will be by written communication and must be received in this office by not later than the fifth business day following the date on which the well is placed on production. The notification shall provide, as a minimum, the following informational items:
  - Operator name, address, and telephone number.
  - Well name and number.
  - Well location (1/4, Sec., Twn, Rng, and P.M.).
  - Date well was placed in a producing status (date of first production for which royalty will be paid).
  - The nature of the well's production, (i.e., crude oil, or crude oil and casing head gas, or natural gas and entrained liquid hydrocarbons).
  - The Federal or Indian lease prefix and number on which the well is located; otherwise the non-Federal or non-Indian land category, i.e., State or private.
  - Unit agreement and/or participating area name and number, if applicable.
  - Communitization agreement number, if applicable.
- Any venting or flaring of gas shall be done in accordance with Notice to Lessees (NTL) 4A and needs prior approval from the BLM Vernal Field Office.
- All undesirable events (fires, accidents, blowouts, spills, discharges) as specified in NTL 3A will be reported to the BLM, Vernal Field Office. Major events, as defined in NTL3A, shall be reported verbally within 24 hours, followed by a written report within 15 days. "Other than Major Events" will be reported in writing within 15 days. "Minor Events" will be reported on the Monthly Report of Operations and Production.



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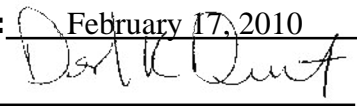
Page 7 of 8  
Well: NBU 920-13B  
12/17/2009

DIV. OF OIL, GAS & MINING

- Whether the well is completed as a dry hole or as a producer, "Well Completion and Recompletion Report and Log" (BLM Form 3160-4) shall be submitted not later than 30 days after completion of the well or after completion of operations being performed, in accordance with 43 CFR 3162.4-1. Two copies of all logs run, core descriptions, and all other surveys or data obtained and compiled during the drilling, workover, and/or completion operations, shall be filed on BLM Form 3160-4. Submit with the well completion report a geologic report including, at a minimum, formation tops, and a summary and conclusions. Also include deviation surveys, sample descriptions, strip logs, core data, drill stem test data, and results of production tests if performed. Samples (cuttings, fluid, and/or gas) shall be submitted only when requested by the BLM, Vernal Field Office.
- All off-lease storage, off-lease measurement, or commingling on-lease or off-lease, shall have prior written approval from the BLM Vernal Field Office.
- Oil and gas meters shall be calibrated in place prior to any deliveries. The BLM Vernal Field Office Petroleum Engineers will be provided with a date and time for the initial meter calibration and all future meter proving schedules. A copy of the meter calibration reports shall be submitted to the BLM Vernal Field Office. All measurement facilities will conform to the API standards for liquid hydrocarbons and the AGA standards for natural gas measurement. All measurement points shall be identified as the point of sale or allocation for royalty purposes.
- A schematic facilities diagram as required by Onshore Oil & Gas Order No. 3 shall be submitted to the BLM Vernal Field Office within 30 days of installation or first production, whichever occurs first. All site security regulations as specified in Onshore Oil & Gas Order No. 3 shall be adhered to. All product lines entering and leaving hydrocarbon storage tanks will be effectively sealed in accordance with Onshore Oil & Gas Order No. 3.
- Any additional construction, reconstruction, or alterations of facilities, including roads, gathering lines, batteries, etc., which will result in the disturbance of new ground, shall require the filing of a suitable plan and need prior approval of the BLM Vernal Field Office. Emergency approval may be obtained orally, but such approval does not waive the written report requirement.
- No location shall be constructed or moved, no well shall be plugged, and no drilling or workover equipment shall be removed from a well to be placed in a suspended status without prior approval of the BLM Vernal Field Office. If operations are to be suspended for more than 30 days, prior approval of the BLM Vernal Field Office shall be obtained and notification given before resumption of operations.
- Pursuant to Onshore Oil & Gas Order No. 7, this is authorization for pit disposal of water produced from this well for a period of 90 days from the date of initial production. A permanent disposal method must be approved by this office and in operation prior to the end of this 90-day period. In order to meet this deadline, an application for the proposed permanent disposal method shall be submitted along with any necessary water analyses, as soon as possible, but no later than 45 days after the date of first production. Any method of disposal which has not been approved prior to the end of the authorized 90-day period will be considered as an Incident of Noncompliance and will be grounds for issuing a shut-in order until an acceptable manner for disposing of said water is provided and approved by this office.

- Unless the plugging is to take place immediately upon receipt of oral approval, the Field Office Petroleum Engineers must be notified at least 24 hours in advance of the plugging of the well, in order that a representative may witness plugging operations. If a well is suspended or abandoned, all pits must be fenced immediately until they are backfilled. The "Subsequent Report of Abandonment" (Form BLM 3160-5) must be submitted within 30 days after the actual plugging of the well bore, showing location of plugs, amount of cement in each, and amount of casing left in hole, and the current status of the surface restoration.

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<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>			
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579			
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> Ute			
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES			
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B			
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000			
<b>PHONE NUMBER:</b> 720 929-6007 Ext		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES			
<b>COUNTY:</b> UTAH		<b>STATE:</b> UTAH			
<b>11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA</b>					
<b>TYPE OF SUBMISSION</b>	<b>TYPE OF ACTION</b>				
<input checked="" type="checkbox"/> <b>NOTICE OF INTENT</b> Approximate date work will start: 2/12/2010  <input type="checkbox"/> <b>SUBSEQUENT REPORT</b> Date of Work Completion:  <input type="checkbox"/> <b>SPUD REPORT</b> Date of Spud:  <input type="checkbox"/> <b>DRILLING REPORT</b> Report Date:	<table style="width: 100%; border: none;"> <tr> <td style="width: 33%; vertical-align: top;"> <input type="checkbox"/> ACIDIZE  <input checked="" type="checkbox"/> CHANGE TO PREVIOUS PLANS  <input type="checkbox"/> CHANGE WELL STATUS  <input type="checkbox"/> DEEPEN  <input type="checkbox"/> OPERATOR CHANGE  <input type="checkbox"/> PRODUCTION START OR RESUME  <input type="checkbox"/> REPERFORATE CURRENT FORMATION  <input type="checkbox"/> TUBING REPAIR  <input type="checkbox"/> WATER SHUTOFF  <input type="checkbox"/> WILDCAT WELL DETERMINATION         </td> <td style="width: 33%; vertical-align: top;"> <input type="checkbox"/> ALTER CASING  <input type="checkbox"/> CHANGE TUBING  <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS  <input type="checkbox"/> FRACTURE TREAT  <input type="checkbox"/> PLUG AND ABANDON  <input type="checkbox"/> RECLAMATION OF WELL SITE  <input type="checkbox"/> SIDETRACK TO REPAIR WELL  <input type="checkbox"/> VENT OR FLARE  <input type="checkbox"/> SI TA STATUS EXTENSION  <input type="checkbox"/> OTHER         </td> <td style="width: 33%; vertical-align: top;"> <input type="checkbox"/> CASING REPAIR  <input type="checkbox"/> CHANGE WELL NAME  <input type="checkbox"/> CONVERT WELL TYPE  <input type="checkbox"/> NEW CONSTRUCTION  <input type="checkbox"/> PLUG BACK  <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION  <input type="checkbox"/> TEMPORARY ABANDON  <input type="checkbox"/> WATER DISPOSAL  <input type="checkbox"/> APD EXTENSION            OTHER:         </td> </tr> </table>		<input type="checkbox"/> ACIDIZE <input checked="" type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> DEEPEN <input type="checkbox"/> OPERATOR CHANGE <input type="checkbox"/> PRODUCTION START OR RESUME <input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> WATER SHUTOFF <input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> ALTER CASING <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> SI TA STATUS EXTENSION <input type="checkbox"/> OTHER	<input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CONVERT WELL TYPE <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> PLUG BACK <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION <input type="checkbox"/> TEMPORARY ABANDON <input type="checkbox"/> WATER DISPOSAL <input type="checkbox"/> APD EXTENSION OTHER:
<input type="checkbox"/> ACIDIZE <input checked="" type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> DEEPEN <input type="checkbox"/> OPERATOR CHANGE <input type="checkbox"/> PRODUCTION START OR RESUME <input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> WATER SHUTOFF <input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> ALTER CASING <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> SI TA STATUS EXTENSION <input type="checkbox"/> OTHER	<input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CONVERT WELL TYPE <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> PLUG BACK <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION <input type="checkbox"/> TEMPORARY ABANDON <input type="checkbox"/> WATER DISPOSAL <input type="checkbox"/> APD EXTENSION OTHER:			
<b>12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.</b> Kerr-McGee Oil & Gas Onshore LP (Kerr-McGee) respectfully requests to change the surface casing size for this well from FROM: 9-5/8" TO: 8-5/8". Additionally, Kerr-McGee requests to change the cement program for this well due to a revised drilling procedure. The production casing will still be cemented it's entire length to the surface. Please see the attached drilling program for additional details. All other information remains the same. Please contact the undersigned with any questions and/or comments. Thank you.					
<b>Accepted by the Utah Division of Oil, Gas and Mining</b>  <b>Date:</b> February 17, 2010 <b>By:</b> 					
<b>NAME (PLEASE PRINT)</b> Danielle Piernot	<b>PHONE NUMBER</b> 720 929-6156	<b>TITLE</b> Regulatory Analyst			
<b>SIGNATURE</b> N/A	<b>DATE</b> 2/11/2010				

**KERR-McGEE OIL & GAS ONSHORE LP**  
**DRILLING PROGRAM**

COMPANY NAME	KERR-McGEE OIL & GAS ONSHORE LP	DATE	February 11, 2010		
WELL NAME	NBU 920-13B	TD	10,600'	MD/TVD	
FIELD	Natural Buttes	COUNTY	Uintah	STATE	Utah
		ELEVATION	4,769'	GL	KB 4,784'
SURFACE LOCATION	NWNE 925' FNL & 1555' FEL, Sec. 13, T 9S R 20E				BHL
	Latitude:	40.040330	Longitude:	-109.610710	NAD 27
OBJECTIVE ZONE(S)	Mesaverde				
ADDITIONAL INFO	Regulatory Agencies: BLM (MINERALS), BIA (SURFACE), UDOGM, Tri-County Health Dept.				

GEOLOGICAL			MECHANICAL		
LOGS	FORMATION	DEPTH	HOLE SIZE	CASING SIZE	MUD WEIGHT
		40'		14"	
			11"	8-5/8", 28#, IJ-55, LTC	Air mist
Catch water sample, if possible, from 0 to 5,189'					
	Green River @	1,779'			
	Top of Birds Nest Water @	2,038'			
	Mahogany @	2,558'			
	Preset f/ GL @				
	2,800' MD				
	Note: 11" surface hole will usually be drilled ±400' below the bottom of lost circulation zone. Drilled depth may be ±200' of the estimated set depth depending on the actual depth of the loss zone.				
Mud logging program TBD					
Open hole logging program f/ TD - surf csg			7-7/8"	4-1/2", 11.6#, I-80 or equivalent LTC casing	Water/Fresh Water Mud 8.3-12.6 ppg
	Wasatch @	5,189'			
	Mverde @	8,378'			
	MVU2 @	9,380'			
	MVL1 @	9,897'			
	TD @	10,600'			Max anticipated Mud required 12.6 ppg





# KERR-McGEE OIL & GAS ONSHORE LP DRILLING PROGRAM

## CASING PROGRAM

	SIZE	INTERVAL	WT.	GR.	CPLG.	DESIGN FACTORS		
						BURST	COLLAPSE	TENSION
CONDUCTOR	14"	0-40'				3,390	1,880	348,000
SURFACE	8-5/8"	0 to 2,800'	28.00	IJ-55	LTC	0.73 7780	1.43 6350	5.07 201000
PRODUCTION	4-1/2"	0 to 10600	11.60	I-80	LTC	1.69	0.91	1.87

- 1) Max Anticipated Surf. Press.(MASP) (Surface Casing) = (Pore Pressure at next csg point-(0.22 psi/ft-partial evac gradient x TVD of next csg point)
- 2) MASP (Prod Casing) = Pore Pressure at TD - (.22 psi/ft-partial evac gradient x TD)
- (Burst Assumptions: TD = 12.6 ppg) .22 psi/ft = gradient for partially evac wellbore
- (Collapse Assumption: Fully Evacuated Casing, Max MW) (Tension Assumptions: Air Weight of Casing\*Buoy.Fact. of water)
- MASP 4240 psi

## CEMENT PROGRAM

		FT. OF FILL	DESCRIPTION	SACKS	EXCESS	WEIGHT	YIELD
SURFACE	TAIL	500	Premium cmt + 2% CaCl	215	60%	15.80	1.15
Option 1			+ .25 pps flocele				
	TOP OUT CMT (6 jobs)	1200	20 gals sodium silicate + Premium cmt	270	0%	15.80	1.15
			+ 2% CaCl + .25 pps flocele				
SURFACE		NOTE: If well will circulate water to surface, option 2 will be utilized					
Option 2	LEAD	2000	Prem cmt + 16% Gel + 10 pps gilsonite	180	35%	11.00	3.82
			+ .25 pps Flocele + 3% salt BWOC				
	TAIL	500	Premium cmt + 2% CaCl	150	35%	15.80	1.15
			+ .25 pps flocele				
	TOP OUT CMT	as required	Premium cmt + 2% CaCl	as req.		15.80	1.15
PRODUCTION	LEAD	4,680'	Premium Lite II + 3% KCl + 0.25 pps	440	40%	11.00	3.38
			celloflake + 5 pps gilsonite + 10% gel				
			+ 0.5% extender				
	TAIL	5,920'	50/50 Poz/G + 10% salt + 2% gel	1450	40%	14.30	1.31
			+ .1% R-3				

\*Substitute caliper hole volume plus 0% excess for LEAD if accurate caliper is obtained

\*Substitute caliper hole volume plus 10% excess for TAIL if accurate caliper is obtained

## FLOAT EQUIPMENT & CENTRALIZERS

SURFACE	Guide shoe, 1 jt, insert float. Centralize first 3 joints with bow spring centralizers. Thread lock guide shoe.
PRODUCTION	Float shoe, 1 jt, float collar. Centralize first 3 joints & every third joint to top of tail cement with bow spring centralizers.

## ADDITIONAL INFORMATION

Test casing head to 750 psi after installing. Test surface casing to 1,500 psi prior to drilling out.

BOPE: 11" 5M with one annular and 2 rams. Test to 5,000 psi (annular to 2,500 psi) prior to drilling out. Record on chart recorder & tour sheet. Function test rams on each trip. Maintain safety valve & inside BOP on rig floor at all times. Kelly to be equipped with upper & lower kelly valves.

Drop Totco surveys every 2000'. Maximum allowable hole angle is 5 degrees.

Most rigs have PVT Systems for mud monitoring. If no PVT is available, visual monitoring will be utilized.

DRILLING ENGINEER:

John Huycke

DATE:

DRILLING SUPERINTENDENT:

Lovel Young

DATE:

NBU 920-13B.xls

RECEIVED February 11, 2010

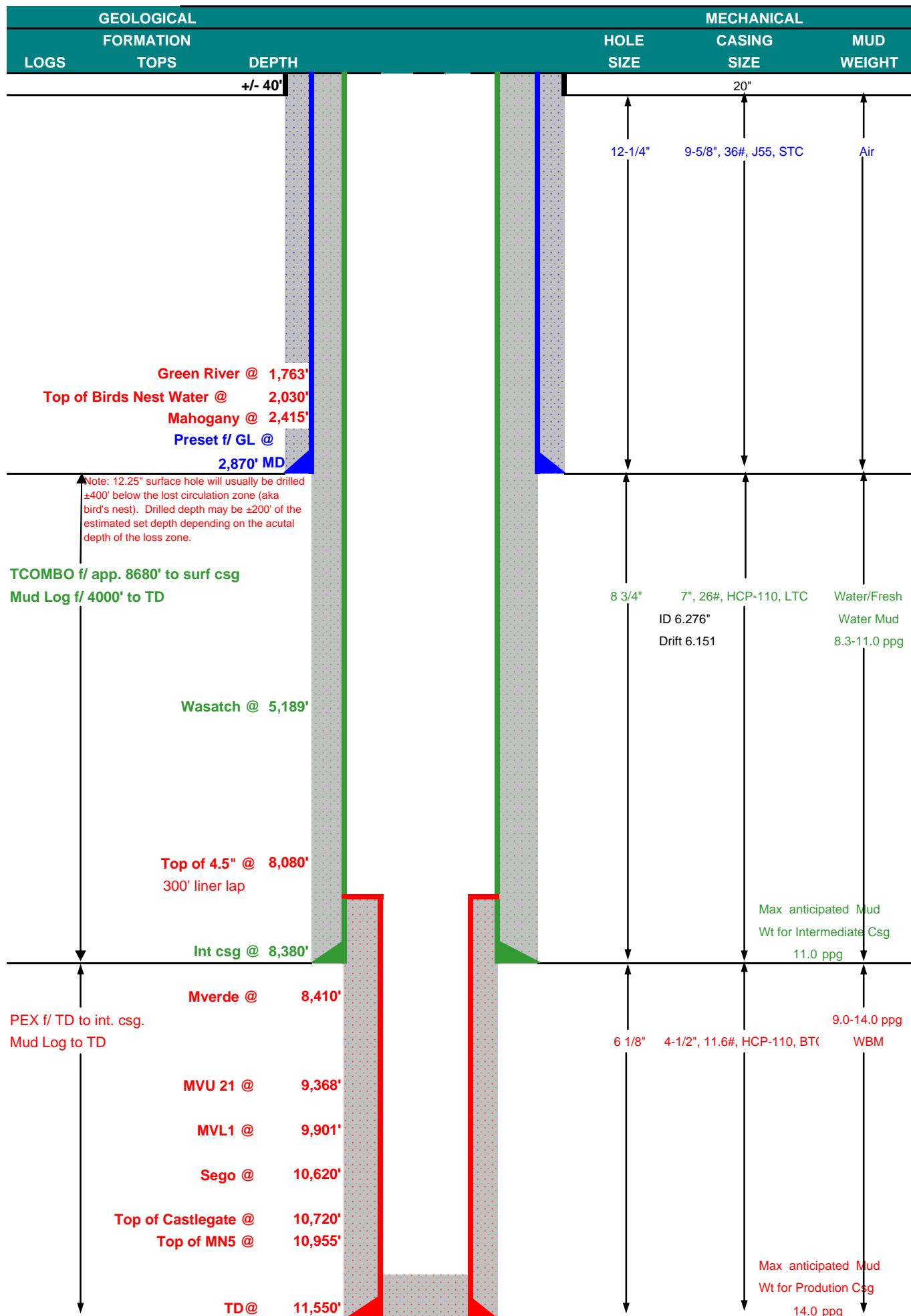
API Well No: 43047501520000

<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>																														
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579																														
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> Ute																														
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES																														
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B																														
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000																														
<b>PHONE NUMBER:</b> 720 929-6007 Ext		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES																														
<b>COUNTY:</b> UINTAH		<b>STATE:</b> UTAH																														
<b>11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA</b>																																
<b>TYPE OF SUBMISSION</b>  <input checked="" type="checkbox"/> <b>NOTICE OF INTENT</b> Approximate date work will start: 9/10/2010  <input type="checkbox"/> <b>SUBSEQUENT REPORT</b> Date of Work Completion:  <input type="checkbox"/> <b>SPUD REPORT</b> Date of Spud:  <input type="checkbox"/> <b>DRILLING REPORT</b> Report Date:	<b>TYPE OF ACTION</b>  <table style="width:100%; border: none;"> <tr> <td><input type="checkbox"/> ACIDIZE</td> <td><input type="checkbox"/> ALTER CASING</td> <td><input type="checkbox"/> CASING REPAIR</td> </tr> <tr> <td><input type="checkbox"/> CHANGE TO PREVIOUS PLANS</td> <td><input type="checkbox"/> CHANGE TUBING</td> <td><input type="checkbox"/> CHANGE WELL NAME</td> </tr> <tr> <td><input type="checkbox"/> CHANGE WELL STATUS</td> <td><input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS</td> <td><input type="checkbox"/> CONVERT WELL TYPE</td> </tr> <tr> <td><input checked="" type="checkbox"/> DEEPEN</td> <td><input type="checkbox"/> FRACTURE TREAT</td> <td><input type="checkbox"/> NEW CONSTRUCTION</td> </tr> <tr> <td><input type="checkbox"/> OPERATOR CHANGE</td> <td><input type="checkbox"/> PLUG AND ABANDON</td> <td><input type="checkbox"/> PLUG BACK</td> </tr> <tr> <td><input type="checkbox"/> PRODUCTION START OR RESUME</td> <td><input type="checkbox"/> RECLAMATION OF WELL SITE</td> <td><input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION</td> </tr> <tr> <td><input type="checkbox"/> REPERFORATE CURRENT FORMATION</td> <td><input type="checkbox"/> SIDETRACK TO REPAIR WELL</td> <td><input type="checkbox"/> TEMPORARY ABANDON</td> </tr> <tr> <td><input type="checkbox"/> TUBING REPAIR</td> <td><input type="checkbox"/> VENT OR FLARE</td> <td><input type="checkbox"/> WATER DISPOSAL</td> </tr> <tr> <td><input type="checkbox"/> WATER SHUTOFF</td> <td><input type="checkbox"/> SI TA STATUS EXTENSION</td> <td><input type="checkbox"/> APD EXTENSION</td> </tr> <tr> <td><input type="checkbox"/> WILDCAT WELL DETERMINATION</td> <td><input type="checkbox"/> OTHER</td> <td>OTHER: <input style="width: 100px;" type="text"/></td> </tr> </table>		<input type="checkbox"/> ACIDIZE	<input type="checkbox"/> ALTER CASING	<input type="checkbox"/> CASING REPAIR	<input type="checkbox"/> CHANGE TO PREVIOUS PLANS	<input type="checkbox"/> CHANGE TUBING	<input type="checkbox"/> CHANGE WELL NAME	<input type="checkbox"/> CHANGE WELL STATUS	<input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS	<input type="checkbox"/> CONVERT WELL TYPE	<input checked="" type="checkbox"/> DEEPEN	<input type="checkbox"/> FRACTURE TREAT	<input type="checkbox"/> NEW CONSTRUCTION	<input type="checkbox"/> OPERATOR CHANGE	<input type="checkbox"/> PLUG AND ABANDON	<input type="checkbox"/> PLUG BACK	<input type="checkbox"/> PRODUCTION START OR RESUME	<input type="checkbox"/> RECLAMATION OF WELL SITE	<input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION	<input type="checkbox"/> REPERFORATE CURRENT FORMATION	<input type="checkbox"/> SIDETRACK TO REPAIR WELL	<input type="checkbox"/> TEMPORARY ABANDON	<input type="checkbox"/> TUBING REPAIR	<input type="checkbox"/> VENT OR FLARE	<input type="checkbox"/> WATER DISPOSAL	<input type="checkbox"/> WATER SHUTOFF	<input type="checkbox"/> SI TA STATUS EXTENSION	<input type="checkbox"/> APD EXTENSION	<input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> OTHER	OTHER: <input style="width: 100px;" type="text"/>
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<b>12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.</b> Kerr-McGee Oil & Gas Onshore, L.P. (Kerr-McGee) respectfully requests to change the total depth (TD) to include the Blackhawk formation, which is in the Mesaverde group for this well. Please see the attached for additional details. All of the original information remains the same. Please contact the undersigned with any questions and/or comments. Thank you.																																
<div style="text-align: right;"> <b>Approved by the Utah Division of Oil, Gas and Mining</b>   <b>Date:</b> <u>September 09, 2010</u>  <b>By:</b> </div>																																
<b>NAME (PLEASE PRINT)</b> Danielle Piernot		<b>PHONE NUMBER</b> 720 929-6156																														
<b>SIGNATURE</b> N/A		<b>TITLE</b> Regulatory Analyst																														
<b>DATE</b> 9/7/2010																																

**RECEIVED** September 07, 2010



COMPANY NAME	KERR-McGEE OIL & GAS ONSHORE LP	DATE	September 2, 2010		
WELL NAME	NBU 920-13B	TD	11,550' MD/TV D		
FIELD	Natural Buttes	COUNTY	Uintah	STATE	Utah
				FINISHED ELEVATION	4,731'
SURFACE LOCATION	NW/4 NE/4 325' FNL	1,555' FEL	Sec 13	T 9S	R 20E
	Latitude:	40.040290	Longitude:	-109.611400	NAD 83
OBJECTIVE ZONE(S)	Wasatch/Mesaverde				
ADDITIONAL INFO	Regulatory Agencies: BLM (MINERALS), Ute Tribe (SURFACE), UDOGM, Tri-County Health Dept.				





KERR-McGEE OIL & GAS ONSHORE LP

CASING PROGRAM

							DESIGN FACTORS		
	SIZE	INTERVAL		WT.	GR.	CPLG.	BURST	COLLAPSE	TENSION
CONDUCTOR	14"	0-40'							
SURFACE	9-5/8"	0	to	0	36.00	J-55	STC	2,270	1,370
								254,000	
INTERMEDIATE	7"	0	to	8,380'	26.00	HCP-110	LTC	9,950	6,230
								693,000	
PRODUCTION	4-1/2"	8,080'	to	11,550'	11.60	HCP-110	BTC	1.70	1.30
								4.12	
								10690	8650
								367000	
								1.82	1.03
								10.45	

1) Max Anticipated Surf. Press.(MASP) (Surface Casing) = (Pore Pressure at next csg point-(0.22 psi/ft-partial evac gradient x TVD of next csg point)

2) MASP (Int Casing) = Pore Pressure at Next Casing Point - (.22 psi/ft-partial evac gradient x TVD of next csg point)

3) MASP (Prod Casing) = Pore Pressure at TD - (.22 psi/ft-partial evac gradient x TD)

(Burst Assumptions:MaxPorePress@ Int shoe 11.0 ppg | MW @TD 14.0 ppg) .22 psi/ft = gradient for partially evac wellbore

(Collapse Assumption: Fully Evacuated Casing, Max MW) (Tension Assumptions: Air Weight of Casing\*Buoy.Fact. of water)

MASP = 5867.4

CEMENT PROGRAM

		FT. OF FILL	DESCRIPTION	SACKS	EXCESS*	WEIGHT	YIELD
SURFACE	LEAD	500	Premium cmt + 2% CaCl	215	60%	15.60	1.18
Option 1			+ .25 pps flocele				
	TOP OUT CMT (1)	200	20 gals sodium silicate + Premium cmt	50		15.60	1.18
			+ 2% CaCl + .25 pps flocele				
	TOP OUT CMT (2)	as required	Premium cmt + 2% CaCl	as req.		15.60	1.18
SURFACE		NOTE: If well will circulate water to surface, option 2 will be utilized					
Option 2	LEAD	1500	Prem cmt + 16% Gel + 10 pps gilsonite	170	35%	11.00	3.82
			+.25 pps Flocele + 3% salt BWOC				
	TAIL	500	Premium cmt + 2% CaCl	180	35%	15.60	1.18
			+ .25 pps flocele				
	TOP OUT CMT	as required	Premium cmt + 2% CaCl	as req.		15.60	1.18
INTERMEDIATE	LEAD	4,689'	Premium Lite II + 3% KCl + 0.25 pps celloflake + 5 pps gilsonite + 10% gel	300	40%	11.00	3.38
			+ 0.5% extender				
	TAIL	3,691'	50/50 Poz/G + 10% salt + 2% gel	610	40%	14.30	1.31
PRODUCTION	Lead	0,000'	Premium Lite II High Strength + 5 pps Kolseal + 3% KCl + 0.05 pps Static-free	0	10%	13.00	1.97
			+ 0.7% R-3 + 0.25 pps celloflake		*no excess in cased interval		
			+ 0.7% FL-52				
	Tail	3,470'	50/50 Poz/G + 3% gel + 0.6% FL-52	260	10%	14.10	1.54
			+ 0.3% R-3 + 0.25 pps celloflake				
			+ 20% silica + 0.05 pps Static-free				

\*Substitute caliper hole volume plus 0% excess for LEAD if accurate caliper is obtained

\*Substitute caliper hole volume plus 15% excess for TAIL if accurate caliper is obtained

FLOAT EQUIPMENT & CENTRALIZERS

SURFACE	Guide shoe, 1 jt, insert float. Centralize first 3 joints with bow spring centralizers. Thread lock guide shoe.
INTERMEDIATE	Float shoe, 1 jt, float collar. Centralize first 3 joints & every third joint to top of tail cement with bow spring centralizers.
PRODUCTION	Float shoe, 1 jt, float collar. Centralize first 3 joints & every third joint to top of cement with bow spring centralizers.

ADDITIONAL INFORMATION

Test casing head to 750 psi after installing. Test surface casing to 1,500 psi prior to drilling out.
BOPE: 11" 10M with one annular and 3 rams. Test to 10,000 psi (annular to 5,000 psi) prior to drilling out. Record on chart recorder & tour sheet. Function test rams on each trip. Maintain safety valve & inside BOP on rig floor at all times. Kelly to be equipped with upper & lower kelly valves.
Run Totco surveys every 2000'. Maximum allowable hole angle is 5 degrees.
Most rigs have PVT Systems for mud monitoring. If no PVT is available, visual monitoring will be utilized.

DRILLING ENGINEER:	Emile Goodwin / Perry Daughtery	DATE:	
DRILLING SUPERINTENDENT:	John Merkel / Lovell Young	DATE:	



## BLM - Vernal Field Office - Notification Form

Operator KERR-McGEE OIL & GAS Rig Name/# BUCKET RIG  
Submitted By ANDY LYTLE Phone Number 720.929.6100  
Well Name/Number NBU 920-13B  
Qtr/Qtr NWNE Section 13 Township 9S Range 20E  
Lease Serial Number UTU-0579  
API Number 4304750152

Spud Notice – Spud is the initial spudding of the well, not drilling out below a casing string.

Date/Time 09/27/2010 08:00 HRS AM ☐ PM ☐

Casing – Please report time casing run starts, not cementing times.

- ☒ Surface Casing  
☐ Intermediate Casing  
☐ Production Casing  
☐ Liner  
☐ Other

RECEIVED

SEP 23 2010

DIV. OF OIL, GAS & MINING

Date/Time 10/17/2010 08:00 HRS AM ☐ PM ☐

BOPE

- ☐ Initial BOPE test at surface casing point  
☐ BOPE test at intermediate casing point  
☐ 30 day BOPE test  
☐ Other

Date/Time \_\_\_\_\_ AM ☐ PM ☐

Remarks ESTIMATED DATE AND TIME. PLEASE CONTACT KENNY GATHINGS AT

435.828.0986 OR LOVEL YOUNG AT 435.781.7051

<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> Ute
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000
<b>PHONE NUMBER:</b> 720 929-6007 Ext		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES
<b>COUNTY:</b> UINTAH		<b>STATE:</b> UTAH
<b>11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA</b>		
<b>TYPE OF SUBMISSION</b>	<b>TYPE OF ACTION</b>	
<input type="checkbox"/> <b>NOTICE OF INTENT</b> Approximate date work will start:	<input type="checkbox"/> ACIDIZE	
<input type="checkbox"/> <b>SUBSEQUENT REPORT</b> Date of Work Completion:	<input type="checkbox"/> ALTER CASING	
<input checked="" type="checkbox"/> <b>SPUD REPORT</b> Date of Spud: 9/27/2010	<input type="checkbox"/> CASING REPAIR	
<input type="checkbox"/> <b>DRILLING REPORT</b> Report Date:	<input type="checkbox"/> CHANGE TO PREVIOUS PLANS	
	<input type="checkbox"/> CHANGE TUBING	
	<input type="checkbox"/> CHANGE WELL STATUS	
	<input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS	
	<input type="checkbox"/> DEEPEN	
	<input type="checkbox"/> FRACTURE TREAT	
	<input type="checkbox"/> OPERATOR CHANGE	
	<input type="checkbox"/> PLUG AND ABANDON	
	<input type="checkbox"/> PRODUCTION START OR RESUME	
	<input type="checkbox"/> RECLAMATION OF WELL SITE	
	<input type="checkbox"/> REPERFORATE CURRENT FORMATION	
	<input type="checkbox"/> SIDETRACK TO REPAIR WELL	
	<input type="checkbox"/> TUBING REPAIR	
	<input type="checkbox"/> VENT OR FLARE	
	<input type="checkbox"/> WATER SHUTOFF	
	<input type="checkbox"/> SI TA STATUS EXTENSION	
	<input type="checkbox"/> WILDCAT WELL DETERMINATION	
	<input type="checkbox"/> OTHER: <input style="width: 100px;" type="text"/>	
<b>12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.</b> MIRU PETE MARTIN BUCKET RIG. DRILLED 20" CONDUCTOR HOLE TO 40'. RAN 14" 36.7# SCHEDULE 10 CONDUCTOR PIPE. CMT W/ 28 SX READY MIX SPUD WELL LOCATION ON SEPTEMBER 27, 2010 AT 11:00 HRS.		
<b>Accepted by the</b> <b>Utah Division of</b> <b>Oil, Gas and Mining</b> <b>FOR RECORD ONLY</b> September 29, 2010		
<b>NAME (PLEASE PRINT)</b> Gina Becker	<b>PHONE NUMBER</b> 720 929-6086	<b>TITLE</b> Regulatory Analyst II
<b>SIGNATURE</b> N/A	<b>DATE</b> 9/29/2010	

**STATE OF UTAH**  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS AND MINING

FORM 6

**ENTITY ACTION FORM**

Operator: KERR McGEE OIL & GAS ONSHORE LP Operator Account Number: N 2995  
Address: P.O. Box 173779  
city DENVER  
state CO zip 80217 Phone Number: (720) 929-6100

**Well 1**

API Number	Well Name		QQ	Sec	Twp	Rng	County
4304750152	NBU 920-13B		NWNE	13	9S	20E	UINTAH
Action Code	Current Entity Number	New Entity Number	Spud Date			Entity Assignment Effective Date	
<u>B</u>	99999	<u>2900</u>	9/27/2010			<u>10/11/10</u>	
<b>Comments:</b> MIRU PETE MARTIN BUCKET RIG. <u>WSMVD</u> SPUD WELL LOCATION ON 9/27/2010 AT 11:00 HRS.							

**Well 2**

API Number	Well Name		QQ	Sec	Twp	Rng	County
Action Code	Current Entity Number	New Entity Number	Spud Date			Entity Assignment Effective Date	
<b>Comments:</b>							

**Well 3**

API Number	Well Name		QQ	Sec	Twp	Rng	County
Action Code	Current Entity Number	New Entity Number	Spud Date			Entity Assignment Effective Date	
<b>Comments:</b>							

**ACTION CODES:**

- A - Establish new entity for new well (single well only)
- B - Add new well to existing entity (group or unit well)
- C - Re-assign well from one existing entity to another existing entity
- D - Re-assign well from one existing entity to a new entity
- E - Other (Explain in 'comments' section)

ANDY LYTLE

Name (Please Print)

  
Signature

REGULATORY ANALYST

Title

9/29/2010

Date

**RECEIVED**

**SEP 29 2010**

<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> Ute
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000
<b>PHONE NUMBER:</b> 720 929-6007 Ext		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES
<b>COUNTY:</b> UINTAH		<b>STATE:</b> UTAH
<b>11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA</b>		
<b>TYPE OF SUBMISSION</b>	<b>TYPE OF ACTION</b>	
<input type="checkbox"/> <b>NOTICE OF INTENT</b> Approximate date work will start:	<input type="checkbox"/> ACIDIZE	
<input type="checkbox"/> <b>SUBSEQUENT REPORT</b> Date of Work Completion:	<input type="checkbox"/> ALTER CASING	
<input type="checkbox"/> <b>SPUD REPORT</b> Date of Spud:	<input type="checkbox"/> CASING REPAIR	
<input checked="" type="checkbox"/> <b>DRILLING REPORT</b> Report Date: 10/2/2010	<input type="checkbox"/> CHANGE TO PREVIOUS PLANS	
	<input type="checkbox"/> CHANGE TUBING	
	<input type="checkbox"/> CHANGE WELL STATUS	
	<input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS	
	<input type="checkbox"/> DEEPEN	
	<input type="checkbox"/> FRACTURE TREAT	
	<input type="checkbox"/> OPERATOR CHANGE	
	<input type="checkbox"/> PLUG AND ABANDON	
	<input type="checkbox"/> PRODUCTION START OR RESUME	
	<input type="checkbox"/> RECLAMATION OF WELL SITE	
	<input type="checkbox"/> REPERFORATE CURRENT FORMATION	
	<input type="checkbox"/> SIDETRACK TO REPAIR WELL	
	<input type="checkbox"/> TUBING REPAIR	
	<input type="checkbox"/> VENT OR FLARE	
	<input type="checkbox"/> WATER SHUTOFF	
	<input type="checkbox"/> SI TA STATUS EXTENSION	
	<input type="checkbox"/> WILDCAT WELL DETERMINATION	
	<input type="checkbox"/> OTHER: <input style="width: 100px;" type="text"/>	
<b>12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.</b> MIRU PROPETRO AIR RIG ON SEPTEMBER 29, 2010. DRILLED 11" SURFACE HOLE TO 2864'. RAN 8 5/8" 28# IJ-55 SURFACE CSG. LEAD CEMENT W/ 23 SX CLASS G PREM @ 11.0 PPG, 3.82 YD. TAILED CEMENT W/ 200 SX CLASS G PREM LITE @ 15.8 PPG, 1.15 YD. DROP PLUG ON THE FLY, DISPLACED W/ 212 BBLS WATER @ 500 PSI, BUMPED PLUG W/ 900 PSI, FLOATS HELD. GOOD RETURNS THROUGHOUT JOB W/ 17 BBLS LEAD TO PIT. CEMENT FELL BACK APPROX 642'. PUMPED 176 SKS SAME CEMENT - CEMENT STAYED AT SURFACE. WORT.		
<div style="text-align: right;"> <b>Accepted by the</b>  <b>Utah Division of</b>  <b>Oil, Gas and Mining</b>  <b>FOR RECORD ONLY</b>          October 06, 2010       </div>		
<b>NAME (PLEASE PRINT)</b> Gina Becker	<b>PHONE NUMBER</b> 720 929-6086	<b>TITLE</b> Regulatory Analyst II
<b>SIGNATURE</b> N/A	<b>DATE</b> 10/4/2010	



UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENTFORM APPROVED  
OMB NO. 1004-0135  
Expires: July 31, 2010**SUNDRY NOTICES AND REPORTS ON WELLS**  
**Do not use this form for proposals to drill or to re-enter an abandoned well. Use form 3160-3 (APD) for such proposals.**5. Lease Serial No.  
UTU0579

6. If Indian, Allottee or Tribe Name

**SUBMIT IN TRIPLICATE - Other instructions on reverse side.**7. If Unit or CA/Agreement, Name and/or No.  
UTU63047A

1. Type of Well

☐ Oil Well ☒ Gas Well ☐ Other8. Well Name and No.  
NBU 920-13B

2. Name of Operator

KERR-MCGEE OIL &amp; GAS ONSHORE

Contact: GINA T BECKER

Mail: gina.becker@anadarko.com

9. API Well No.  
43-007-50152

3a. Address

1099 18TH STREET SUITE 1800  
DENVER, CO 80202

3b. Phone No. (include area code)

Ph: 720-929-6086  
Fx: 720-929-708610. Field and Pool, or Exploratory  
NATURAL BUTTES

4. Location of Well (Footage, Sec., T., R., M., or Survey Description)

Sec 13 T9S R20E NWNE 925FNL 1555FEL

11. County or Parish, and State  
UINTAH COUNTY, UT

## 12. CHECK APPROPRIATE BOX(ES) TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION			
<input type="checkbox"/> Notice of Intent	<input type="checkbox"/> Acidize	<input type="checkbox"/> Deepen	<input type="checkbox"/> Production (Start/Resume)	<input type="checkbox"/> Water Shut-Off
<input checked="" type="checkbox"/> Subsequent Report	<input type="checkbox"/> Alter Casing	<input type="checkbox"/> Fracture Treat	<input type="checkbox"/> Reclamation	<input type="checkbox"/> Well Integrity
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Casing Repair	<input type="checkbox"/> New Construction	<input type="checkbox"/> Recomplete	<input checked="" type="checkbox"/> Other
	<input type="checkbox"/> Change Plans	<input type="checkbox"/> Plug and Abandon	<input type="checkbox"/> Temporarily Abandon	Well Spud
	<input type="checkbox"/> Convert to Injection	<input type="checkbox"/> Plug Back	<input type="checkbox"/> Water Disposal	

13. Describe Proposed or Completed Operation (clearly state all pertinent details, including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recompleat horizontally, give subsurface locations and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No. on file with BLM/BIA. Required subsequent reports shall be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompleat in a new interval, a Form 3160-4 shall be filed once testing has been completed. Final Abandonment Notices shall be filed only after all requirements, including reclamation, have been completed, and the operator has determined that the site is ready for final inspection.)

MIRU PETE MARTIN BUCKET RIG. DRILLED 20" CONDUCTOR HOLE TO 40".  
RAN 14" 36.7# SCHEDULE 10 CONDUCTOR PIPE. CMT W/ 28 SX READY MIX.  
SPUD WELL LOCATION ON SEPTEMBER 27, 2010 AT 11:00 HRS.

14. I hereby certify that the foregoing is true and correct.

**Electronic Submission #93683 verified by the BLM Well Information System  
For KERR-MCGEE OIL & GAS ONSHORE, sent to the Vernal**

Name (Printed/Typed) GINA T BECKER

Title REGULATORY ANALYST II

Signature

(Electronic Submission)

Date 09/29/2010

**THIS SPACE FOR FEDERAL OR STATE OFFICE USE**

Approved By

Title

Date

Conditions of approval, if any, are attached. Approval of this notice does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Office

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

**\*\* OPERATOR-SUBMITTED \*\* OPERATOR-SUBMITTED \*\* OPERATOR-SUBMITTED****RECEIVED**  
**OCT 11 2010**BUREAU OF LAND MANAGEMENT  
DIVISION OF OIL, GAS & MINING

<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> Ute
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000
<b>PHONE NUMBER:</b> 720 929-6007 Ext		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES
<b>COUNTY:</b> UINTAH		<b>STATE:</b> UTAH

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
<input type="checkbox"/> <b>NOTICE OF INTENT</b> Approximate date work will start:	<input type="checkbox"/> ACIDIZE <input type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> DEEPEN <input type="checkbox"/> OPERATOR CHANGE <input type="checkbox"/> PRODUCTION START OR RESUME <input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> WATER SHUTOFF <input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> ALTER CASING <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> SI TA STATUS EXTENSION <input type="checkbox"/> OTHER	<input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CONVERT WELL TYPE <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> PLUG BACK <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION <input type="checkbox"/> TEMPORARY ABANDON <input type="checkbox"/> WATER DISPOSAL <input type="checkbox"/> APD EXTENSION OTHER: <input style="width: 100px;" type="text"/>
<input type="checkbox"/> <b>SUBSEQUENT REPORT</b> Date of Work Completion:			
<input type="checkbox"/> <b>SPUD REPORT</b> Date of Spud:			
<input checked="" type="checkbox"/> <b>DRILLING REPORT</b> Report Date: 11/25/2010			

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.  
 DRILLED FROM 2864' TO 10,705'. RAN 7" 26# P-110 LTC INTERMEDIATE CSG TO 10,672'. PUMP 420 SX CLASS G PREM LITE @ 12.9 PPG, 1.76 YD. TAILER W/ 760 SX CLASS G 50/50 POZ MIX @ 14.5 PPG, 1.28 YD. FINISHED DRILLING FROM 10,705' TO 11,620' ON 11/22/2010. RAN 4 1/2" LINER TO 11,618'. CEMENT W/ 22 BBL 14.5 PPG SLURRY CEMENT /1.27 YIELD/ 9.41 GAL SK / 90 SK 50/50 POZ. 70' CEMENT ON TOP OF LINER. RD CEMENTERS AND CLEANED PITS. RELEASED H&P RIG #298 ON NOVEMBER 25, 2010 @ 06:00 HRS.

<b>NAME (PLEASE PRINT)</b> Andy Lytle	<b>PHONE NUMBER</b> 720 929-6100	<b>TITLE</b> Regulatory Analyst
<b>SIGNATURE</b> N/A		<b>DATE</b> 12/1/2010

<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> Ute
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000
<b>PHONE NUMBER:</b> 720 929-6007 Ext		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES
<b>COUNTY:</b> UINTAH		<b>STATE:</b> UTAH

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
<input type="checkbox"/> <b>NOTICE OF INTENT</b> Approximate date work will start:	<input type="checkbox"/> ACIDIZE <input type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> DEEPEN <input type="checkbox"/> OPERATOR CHANGE <input checked="" type="checkbox"/> PRODUCTION START OR RESUME <input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> WATER SHUTOFF <input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> ALTER CASING <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> SI TA STATUS EXTENSION <input type="checkbox"/> OTHER	<input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CONVERT WELL TYPE <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> PLUG BACK <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION <input type="checkbox"/> TEMPORARY ABANDON <input type="checkbox"/> WATER DISPOSAL <input type="checkbox"/> APD EXTENSION OTHER: <input style="width: 100px;" type="text"/>
<input type="checkbox"/> <b>SUBSEQUENT REPORT</b> Date of Work Completion:			
<input type="checkbox"/> <b>SPUD REPORT</b> Date of Spud:			
<input checked="" type="checkbox"/> <b>DRILLING REPORT</b> Report Date: 1/12/2011			

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.  
 THE SUBJECT WELL WAS PLACED ON PRODUCTION ON JANUARY 12, 2011 AT 5:30 P.M. THE CHRONOLOGICAL WELL HISTORY WILL BE SUBMITTED WITH THE WELL COMPLETION REPORT.

Accepted by the  
 Utah Division of  
 Oil, Gas and Mining  
**FOR RECORD ONLY**  
 01/13/2011

<b>NAME (PLEASE PRINT)</b> Gina Becker	<b>PHONE NUMBER</b> 720 929-6086	<b>TITLE</b> Regulatory Analyst II
<b>SIGNATURE</b> N/A	<b>DATE</b> 1/13/2011	

<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> Ute
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000
<b>PHONE NUMBER:</b> 720 929-6515 Ext		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES
<b>COUNTY:</b> UINTAH		<b>STATE:</b> UTAH

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
<input type="checkbox"/> <b>NOTICE OF INTENT</b> Approximate date work will start:	<input type="checkbox"/> ACIDIZE <input type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> DEEPEN <input type="checkbox"/> OPERATOR CHANGE <input type="checkbox"/> PRODUCTION START OR RESUME <input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> WATER SHUTOFF <input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> ALTER CASING <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> SI TA STATUS EXTENSION <input type="checkbox"/> OTHER	<input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CONVERT WELL TYPE <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> PLUG BACK <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION <input type="checkbox"/> TEMPORARY ABANDON <input type="checkbox"/> WATER DISPOSAL <input type="checkbox"/> APD EXTENSION OTHER: <input style="width: 100px;" type="text"/>
<input type="checkbox"/> <b>SUBSEQUENT REPORT</b> Date of Work Completion:			
<input type="checkbox"/> <b>SPUD REPORT</b> Date of Spud:			
<input checked="" type="checkbox"/> <b>DRILLING REPORT</b> Report Date: 2/11/2011			

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.  
 CORRECTED HOLE SIZE AND SURFACE CSG INFORMATION. ON OCTOBER 4, 2010 A SURFACE CSG SUNDRY WAS SUBMITTED REPORTING AN 11" HOLE WITH 8 5/8" CSG. THIS INFORMATION IS NOT CORRECT; THE SURFACE HOLE WAS 12 1/4" WITH 9 5/8" CSG. REPORT SHOULD HAVE BEEN AS FOLLOWS: MIRU PROPETRO AIR RIG ON SEPTEMBER 29, 2010. DRILLED 12 1/4" SURFACE HOLE TO 2864'. RAN 9 5/8" 40# J-55 SURFACE CSG. LEAD CEMENT W/ 230 SX CLASS G PREM @ 11.0 PPG, 3.82 YD. TAILED CEMENT W/ 200 SX CLASS G PREM LITE @ 15.8 PPG, 1.15 YD. DROP PLUG ON THE FLY, DISPLACED W/ 212 BBLS WATER @ 500 PSI, BUMPED PLUG W/ 900 PSI, FLOATS HELD - GOOD RETURNS THROUGHOUT JOB W/ 17 BBLS LEAD TO PIT. CEMENT FELL BACK APPROX 642'. PUMPED 175 SKS SAME CEMENT - CEMENT STAYED AT SURFACE. WORT.

<b>NAME (PLEASE PRINT)</b> Gina Becker	<b>PHONE NUMBER</b> 720 929-6086	<b>TITLE</b> Regulatory Analyst II
<b>SIGNATURE</b> N/A	<b>DATE</b> 2/11/2011	

 Accepted by the  
 Utah Division of  
 Oil, Gas and Mining  
**FOR RECORD ONLY**



UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENTFORM APPROVED  
OMB No. 1004-0137  
Expires: July 31, 2010

## WELL COMPLETION OR RECOMPLETION REPORT AND LOG

1a. Type of Well <input type="checkbox"/> Oil Well <input checked="" type="checkbox"/> Gas Well <input type="checkbox"/> Dry <input type="checkbox"/> Other			5. Lease Serial No. UTU0579		
b. Type of Completion <input checked="" type="checkbox"/> New Well <input type="checkbox"/> Work Over <input type="checkbox"/> Deepen <input type="checkbox"/> Plug Back <input type="checkbox"/> Diff. Resvr. Other _____			6. If Indian, Allottee or Tribe Name		
2. Name of Operator KERR MCGREE OIL & GAS ONSHORE			7. Unit or CA Agreement Name and No. UTU63047A		
3. Address P.O. BOX 173779 DENVER, CO 80217			8. Lease Name and Well No. NBU 920-13B		
3a. Phone No. (include area code) Ph: 720-929-6100			9. API Well No. 43-047-50152		
4. Location of Well (Report location clearly and in accordance with Federal requirements)* At surface NWNE 925FNL 1555FEL 40.04029 N Lat, 109.61140 W Lon At top prod interval reported below NWNE 925FNL 1555FEL 40.04029 N Lat, 109.61140 W Lon At total depth NWNE 925FNL 1555FEL 40.04029 N Lat, 109.61140 W Lon			10. Field and Pool, or Exploratory NATURAL BUTTES		
14. Date Spudded 09/27/2010			11. Sec., T., R., M., or Block and Survey or Area Sec 13 T9S R20E Mer SLB		
15. Date T.D. Reached 11/22/2010			12. County or Parish UINTAH		
16. Date Completed <input type="checkbox"/> D & A <input checked="" type="checkbox"/> Ready to Prod. 01/12/2011			13. State UT		
17. Elevations (DF, KB, RT, GL)* 4768 GL					
18. Total Depth: MD 11620 TVD 11616			19. Plug Back T.D.: MD 11574 TVD 11570		
20. Depth Bridge Plug Set: MD TVD					
21. Type Electric & Other Mechanical Logs Run (Submit copy of each) CBL/GRBH/SDL/DSN/ACTR, 150/103V			22. Was well cored? <input checked="" type="checkbox"/> No <input type="checkbox"/> Yes (Submit analysis) Was DST run? <input checked="" type="checkbox"/> No <input type="checkbox"/> Yes (Submit analysis) Directional Survey? <input checked="" type="checkbox"/> No <input type="checkbox"/> Yes (Submit analysis)		

## 23. Casing and Liner Record (Report all strings set in well)

Hole Size	Size/Grade	Wt. (#/ft.)	Top (MD)	Bottom (MD)	Stage Cementer Depth	No. of Sk. & Type of Cement	Slurry Vol. (BBL)	Cement Top*	Amount Pulled
20.000	14.000 STEEL	36.0		40		28			
12.250	9.625 J55	40.0		2872		606			
8.750	7.000 HCP110	26.0		10698		1180			
6.125	4.500 HCP110	11.6	10494	11618		90			

## 24. Tubing Record

Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)
2.375	11498							

## 25. Producing Intervals

## 26. Perforation Record

Formation	Top	Bottom	Perforated Interval	Size	No. Holes	Perf. Status
A) MESAVERDE	11151	11452	11151 TO 11452	0.360	96	OPEN
B)						
C)						
D)						

## 27. Acid, Fracture, Treatment, Cement Squeeze, Etc.

Depth Interval	Amount and Type of Material
11151 TO 11452	PUMP 12,275 BBLS SLICK H2O & 302,428 LBS 30/50 SAND

## 28. Production - Interval A

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
01/12/2011	01/17/2011	24	→	0.0	2697.0	725.0			FLows FROM WELL
Choke Size	Tbg. Press. Flwg.	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status	
20/64	SI 1699	2586.0	→	0	2697	725		PGW	

## 28a. Production - Interval B

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
			→						
Choke Size	Tbg. Press. Flwg.	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status	
SI			→						

(See Instructions and spaces for additional data on reverse side)

ELECTRONIC SUBMISSION #102441 VERIFIED BY THE BLM WELL INFORMATION SYSTEM

\*\* OPERATOR-SUBMITTED \*\* OPERATOR-SUBMITTED \*\* OPERATOR-SUBMITTED \*\*

RECEIVED

FEB 22 2011

## 28b. Production - Interval C

Date First Produced	Test Date	Hours Tested	Test Production →	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate →	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status	

## 28c. Production - Interval D

Date First Produced	Test Date	Hours Tested	Test Production →	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate →	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status	

## 29. Disposition of Gas(Sold, used for fuel, vented, etc.)

SOLD

## 30. Summary of Porous Zones (Include Aquifers):

Show all important zones of porosity and contents thereof. Cored intervals and all drill-stem tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures and recoveries.

## 31. Formation (Log) Markers

Formation	Top	Bottom	Descriptions, Contents, etc.	Name	Top Meas. Depth
GREEN RIVER BIRD'S NEST MAHOGANY WASATCH MESAVERDE	1710 1893 2541 5205 8843	  • 8843 11620	TD		

## 32. Additional remarks (include plugging procedure):

Attached is the chronological well history & final survey. Completion chrono details individual frac stages.

## 33. Circle enclosed attachments:

- |   |                    |               |                       |
|---|--------------------|---------------|-----------------------|
| 1. Electrical/Mechanical Logs (1 full set req'd.)     | 2. Geologic Report | 3. DST Report | 4. Directional Survey |
| 5. Sundry Notice for plugging and cement verification | 6. Core Analysis   | 7 Other:      |                       |

## 34. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records (see attached instructions):

Electronic Submission #102441 Verified by the BLM Well Information System.  
For KERR MCGREE OIL & GAS ONSHORE,, sent to the Vernal

Name (please print) ANDREW LYTLETitle REGULATORY ANALYSTSignature (Electronic Submission)Date 02/10/2011

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

**\*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\***

# US ROCKIES REGION

## Operation Summary Report

Well: NBU 920-13B				Spud Conductor: 9/27/2010				Spud Date: 9/29/2010			
Project: UTAH-UINTAH				Site: NBU 920-13B				Rig Name No: PROPETRO/, H&P 298/298			
Event: DRILLING				Start Date: 9/20/2010				End Date: 11/25/2010			
Active Datum: RKB @4,794.00ft (above Mean Sea Leve				UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0							
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation			
9/29/2010	6:00 - 14:00	8.00	MIRU	01	B	P		MOVE ONTO LOCATION, DRESS TOP OF CONDUCTOR & INSTALL DIVERTER HEAD & FLOW LINE - MOVE RIG IN OVER WELL & RIG UP			
	14:00 - 16:00	2.00	DRLSUR	02	B	P		SPUD SURFACE 9/29/10 @ 14:00 hrs- DRLG F/40' TO 160' (120' @ 60fph) MW 8.4, VIS 27, WOB 5/10, RPM 35, MM RPM 50, GPM 460, PSI 500/650			
	16:00 - 17:30	1.50	DRLSUR	06	A	P		POOH CHANGE OUT DIVERTER RUBBER FOR 6" DRILL COLLARS			
	17:30 - 0:00	6.50	DRLSUR	02	B	P		DRLG F/160' TO 500' (340' @ 52fph) MW 8.4, VIS 27, WOB 10/15, RPM 35, MM RPM 55, GPM 500, PSI OFF/ON 900/1100			
9/30/2010	0:00 - 12:00	12.00	DRLSUR	02	B	P		DRLG F/500' TO 1540' (1040' @ 87fph) MW 8.4, VIS 27, WOB 10/15, RPM 35, MM RPM 55, GPM 500, PSI OFF/ON 1025/1250			
	12:00 - 12:30	0.50	DRLSUR	10	A	P		SURVEY @ 1540' .75 deg			
	12:30 - 0:00	11.50	DRLSUR	02	B	P		DRLG F/1540' TO 2200' (660' @ 57fph) MW 8.4, VIS 27, WOB 15, RPM 35/40, MM RPM 55, GPM 500, PSI OFF/ON 1230/1450			
10/1/2010	0:00 - 17:00	17.00	DRLSUR	02	B	P		DRLG F/2200' TO 2864' (664' @ 40fph) MW 8.3, VIS 27, WOB 15, RPM 34/40, MM RPM 55, GPM 500, PSI OFF/ON 1275/1500			
	17:00 - 18:30	1.50	DRLSUR	05	C	P		CIRC HOLE CLEAN			
	18:30 - 0:00	5.50	DRLSUR	06	D	P		POOH LDDP/BHA			
10/2/2010	0:00 - 6:00	6.00	CSG	12	C	P		HPJSM - R/UP & RUN 68 JTS OF 9 5/8 40.00 J-55 LTC CASING - FLOAT SHOE @ 2864' - BAFFLE 2844' - FILL CASING W/WATER -			
	6:00 - 6:30	0.50	CSG	01	E	P		R/DN RIG & MOVE OFF WELL - RELEASE RIG @ 06:30 hrs 10/2/10			
	6:30 - 10:00	3.50	CSG	12	E	P		HPJSM - R/UP PROPETRO - CEMENT 9.625" SURFACE CASING - PUMP 20 BBLS WATER, 230 SKS LEAD 11.0 PPG 3.82 YIELD, 200 SKS TAIL 15.8 PPG 1.15 YIELD, DROPPED PLUG ON FLY & DISPLACED W/212 BBLS FRESH WATER @ 500 PSI, BUMPED PLUG W/900 PSI - FLOATS HELD - GOOD RETURNS THROUGHOUT CMT JOB W/17 BBLS LEAD CEMENT TO PIT - CEMENT FELL BACK APPROX 642' - PUMPED 175 SKS 35.8 BBLS 15.8 PPG 1.15 YIELD CEMENT, CEMENT STAYED AT SURFACE			

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B			Spud Conductor: 9/27/2010			Spud Date: 9/29/2010			
Project: UTAH-UINTAH			Site: NBU 920-13B				Rig Name No: PROPETRO/, H&P 298/298		
Event: DRILLING			Start Date: 9/20/2010			End Date: 11/25/2010			
Active Datum: RKB @4,794.00ft (above Mean Sea Leve			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0						
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation	
	10:00 - 10:00	0.00	CSG					CONDUCTOR CASING: Cond. Depth set: 40 Cement sx used: N/A  SPUD DATE/TIME: 9/29/2010 14:00  SURFACE HOLE: Surface From depth:40 Surface To depth: 2,864 Total SURFACE hours: 49.00 Surface Casing size:9 5/8 # of casing joints ran: 66 Casing set MD:2,846.0 # sx of cement:605 SKS Cement blend (ppg):LEAD 11.0, TAIL 15.8 Cement yield (ft3/sk): LEAD 3.85, TAIL 1.15 # of bbls to surface: 17 Describe cement issues: 17 BBLS CMT TO SURFACE - CMT FELL BACK - PUMP 175 SKS 35 BBLS TOPOUT Describe hole issues: N/A	
11/4/2010	0:00 - 6:30	6.50	RDMO	01	E	P		RIG DOWN EQUIPMENT TO MOVE TO THE NBU 920-13B (8 MILES)	
	6:30 - 19:00	12.50	MIRU	01	A	P		SAFETY MEETING WITH RIG CREWS, TRUCKING CREW & CRANE CREW / 5 BED TRUCKS, 6 HAUL TRUCKS, TWO FORKLIFTS & ONE CRANE ON LOCATION @ 06:30 / MOVED AND SET CAMPS, MUD TANKS, SHALE SHAKERS, MUD PUMPS, V.F.D. HOUSE, WATER TANK, M.C.C. HOUSE, GENERATORS & FUEL TANK / LOWERED DERRICK & LOAD OUT/ LOWERED SUBS / SFTN / RIG 90% MOVED / 15% RIGGED UP	
	19:00 - 0:00	5.00	MIRU	21	C	P		WAIT ON DAY LIGHT	
11/5/2010	0:00 - 6:00	6.00	MIRU	21	C	P		WAIT ON DAYLIGHT	
	6:00 - 19:00	13.00	MIRU	01	B	P		SAFETY MEETING WITH RIG CREWS, TRUCKING CREW & CRANE CREW / 4 BED TRUCKS, 4 HAUL TRUCKS, TWO FORKLIFTS & ONE CRANE// PIN SKID BEAMS / SET & PIN MUD BOAT + RAMPS / SET & PIN SUB STRUCTURE+ COMPONENTS / SUB UP @ 1330 HRS,RAISE SHAKERS ,SET IN GAS BUSTER / SPOT DERRICK / SET IN FLOWLINE/ RELEASED 6 TRUCKS 1 FORKLIFT 18:00 / SFTN / RIG 95% SET IN PLACE, 50% RIGGED UP	
	19:00 - 0:00	5.00	MIRU	21	C	P		WAIT ON DAYLIGHT	
11/6/2010	0:00 - 6:30	6.50	MIRU	21	C	P		WAIT ON DAY LIGHT	
	6:30 - 14:00	7.50	MIRU	01	B	P		HSM W/ JONE TRUCKING & J& C CRANE / PURGE & PIN CYLINDERS TO DERRICK/RAISE DERRICK TO RIG FLOOR & PIN /MOVE CYLINDERS TO RAISE POSITION, RAISE DERRICK UP @ 10:00 / FINISH SET IN ,BOILER FRAC TANKS RUN FLARE LINES/ CAT WALK & STAIRS/ CRANE GONE @1400 / TRUCKS @1400 / RUN ELECT LINES/ / RIG UP FLOOR / PUT DRILL LINE ON DRUM, UNDOCK TOP DRIVE	
	14:00 - 0:00	10.00	MIRU	14	A	P		NIPPLE UP 10K BOP STACK/ CHOKE LINE & MANIFOLD,HYD LINES,ROTATING HEAD /SUPER CHOKE / BUILD DOWN STREAM LINES FROM CHOKES TO GAS BUSTER, MUD PITS & PANIC LINE	

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B			Spud Conductor: 9/27/2010			Spud Date: 9/29/2010			
Project: UTAH-UINTAH			Site: NBU 920-13B				Rig Name No: PROPETRO/, H&P 298/298		
Event: DRILLING			Start Date: 9/20/2010				End Date: 11/25/2010		
Active Datum: RKB @4,794.00ft (above Mean Sea Leve			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0						
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation	
11/7/2010	0:00 - 0:30	0.50	PRPSPD	14	A	P		NIPPLE UP / CHANGE OUT HYDRAULIC ADAPTERS ON 10K BOP STACK & FUNCTION TEST HYDRAULIC LINES	
	0:30 - 11:30	12.00	PRPSPD	15	A	P		PRESSURE TEST PIPE RAMS, BLIND RAMS, IBOP,NO TEST /XO IBOP / FLOOR VALVE, KILL LINES & KILL LINE VALVES, BOP WING VALVES , HCR VALVE + CHOKE LINE; INNER AND OUTER CHOKE VALVES & MANIFOLD TO 250 PSI LOW @ 5 MINUTES + 5000 PSI HIGH @ 10 MINUTES / TEST ANNULAR TO 250 PSI LOW @ 5 MINUTES + 2500 PSI HIGH @ 10 MINUTES / TEST SUPER CHOKE + SURFACE CASING TO 1500 PSI @ 30 MINUTES - FUNCTION TEST CLOSING UNIT / BOP TEST WITNESSED BY DONNA KENNEY BLM (1 HR TIME CHANGE)	
	11:30 - 12:00	0.50	PRPSPD	07	A	P		RIG SERVICE	
	12:00 - 12:30	0.50	PRPSPD	23		P		SET WEAR BUSHING	
	12:30 - 13:00	0.50	PRPSPD	06	A	P		PRE SPUD INSPECTION	
	13:00 - 18:30	5.50	PRPSPD	06	A	P		HSM W/ WEATHERFORD TRS / PU ..21 MUD MTR W/1.5 BEND / 83/4 BIT / DIRECTIONAL TOOLS / ORIENT SAME,/SURFACE TEST / P/U	
	18:30 - 19:00	0.50	DRLIN1	14	B	P		HWDP,56JTS DP/R/D SAME TAG CMT @ 2770	
	19:00 - 20:00	1.00	DRLIN1	02	F	P		INSTALL ROTATING HEAD	
	20:00 - 0:00	4.00	DRLIN1	02	B	P		DRILL CMT F/ 2770 FLOAT@ 2830, SHOE @ 2872 OPEN HOLE TO 2886	
								SPUD 83/4 HOLE @20:00 11/7/2010 DRILL/SURVEY (ROTATE F/ 2886' – T/ 3380' = 494 @ 123.5. FPH / 15K-18K WOB / 40 RPM ON TOP DRIVE / PUMP = 110 SPM @ 495 GPM / PUMP PRESSURE OFF/ON BOTTOM = 1450/1225 PSI / MOTOR RPM = 104 RPM / TORQUE ON/OFF BOTTOM =7K/1K / PU/SO/ROT WT. = 98/95/97 / SLIDE 17' FT' IN 15 MIN =3% OF FOOTAGE DRILLED & 7% OF HRS DRILLED / H2O + POLYMER W/ WEIGHTED SWEEPS +/- 2 PPG	
11/8/2010	0:00 - 6:00	6.00	DRLIN1	02	B	P		DRILL/SURVEY (ROTATE F/ 3380' – T/ 4080' = 700' @ 116.6 FPH / 15K-18K WOB / 40 RPM ON TOP DRIVE / PUMP = 110 SPM @ 495 GPM / PUMP PRESSURE OFF/ON BOTTOM = 1520/1340 PSI / MOTOR RPM = 104 RPM / TORQUE ON/OFF BOTTOM =6K/1K / PU/SO/ROT WT. = 107/100/106 / SLIDE 20' FT' IN 25 MIN =3% OF FOOTAGE DRILLED & 7% OF HRS DRILLED / H2O + POLYMER W/ WEIGHTED SWEEPS +/- 2 PPG	
	6:00 - 16:30	10.50	DRLIN1	02	B	P		DRILL/SURVEY (ROTATE F/ 4080' – T/ 5280' = 1200' @114.2 FPH / 15K-19K WOB / 35-60 RPM ON TOP DRIVE / PUMP = 123 SPM @ 550 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2060/1680 PSI / MOTOR RPM = 115 RPM / TORQUE ON/OFF BOTTOM =8K2K / PU/SO/ROT WT. = 140/1126/132/ SLIDE 100 FT' IN2.5 HRS=8.3% OF FOOTAGE DRILLED & 23% OF HRS DRILLED / H2O + POLYMER W/ WEIGHTED SWEEPS +/- 2 PPG / 5-10' FLARE	
	16:30 - 17:00	0.50	DRLIN1	07	A	P		RIG SERVICE	



**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B			Spud Conductor: 9/27/2010				Spud Date: 9/29/2010		
Project: UTAH-UINTAH			Site: NBU 920-13B				Rig Name No: PROPETRO/, H&P 298/298		
Event: DRILLING			Start Date: 9/20/2010				End Date: 11/25/2010		
Active Datum: RKB @4,794.00ft (above Mean Sea Leve			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0						
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation	
	17:00 - 0:00	7.00	DRLIN1	02	B	P		DRILL/SURVEY (ROTATE F/ 5280' – T/ 6225' = 945' @135 FPH / 15K-19K WOB / 35-60 RPM ON TOP DRIVE / PUMP = 123 SPM @ 550 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2060/11680 PSI / MOTOR RPM = 115 RPM / TORQUE ON/OFF BOTTOM =8K2K / PU/SO/ROT WT. = 140/1126/132/ / H2O + POLYMER W/ WEIGHTED SWEEPS+/- 2+/- PPG/ MUD WT 8.5 VIS 27 5-10' FLARE	
11/9/2010	0:00 - 6:00	6.00	DRLIN1	02	B	P		DRILL/SURVEY (ROTATE F/ 6225– T/ 6800' = 575' @95.8 FPH / 15K-19K WOB / 35-60 RPM ON TOP DRIVE / PUMP = 123 SPM @ 550 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2060/1680 PSI / MOTOR RPM = 115 RPM / TORQUE ON/OFF BOTTOM =8K2K / PU/SO/ROT WT. = 140/1126/132/ / MUD UP @ 6500' / MUD WT 8.9 VIS 31	
	6:00 - 17:00	11.00	DRLIN1	02	B	P		DRILL/SURVEY (ROTATE F/ 6800– T/7456 = 656' @59.6 FPH / 18K-22K WOB / 35-60 RPM ON TOP DRIVE / PUMP = 110 SPM @ 495 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2110/1860 PSI / MOTOR RPM = 104 RPM / TORQUE ON/OFF BOTTOM =6K3K / PU/SO/ROT WT. = 165/148/1157/ / WT 10.2 VIS 36 / NO MUD LOSS	
	17:00 - 17:30	0.50	DRLIN1	07	A	P		RIG SERVICE	
	17:30 - 0:00	6.50	DRLIN1	02	B	P		DRILL/SURVEY (ROTATE F/ 7456– T/7700 = 244' @37.5 FPH / 18K-22K WOB / 35-60 RPM ON TOP DRIVE / PUMP = 110 SPM @ 495 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2040/1910 PSI / MOTOR RPM = 104 RPM / TORQUE ON/OFF BOTTOM =7K2K / PU/SO/ROT WT. = 169/151/164/ / WT 10.4 VIS 36 / NO MUD LOSS	
11/10/2010	0:00 - 14:00	14.00	DRLIN1	02	B	P		DRILL/SURVEY F/ 7700' TO 8,306 = 606' @ 43.28 FPH / 18K-26K WOB / 35-65 RPM ON TOP DRIVE / PUMP = 110 SPM @ 495 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2400/2150 PSI / MOTOR RPM = 109 RPM / TORQUE ON/OFF BOTTOM =6K2K / PU/SO/ROT WT. = 180/170/172/ / MUD WT 10.5 VIS 36 / NO MUD LOSS / MAX GAS 6,080 UNITS / BOP DRILL	
	14:00 - 14:30	0.50	DRLIN1	07	A	P		SERVICE RIG @ 8,306'	
	14:30 - 0:00	9.50	DRLIN1	02	B	P		DRILL / SURVEY F/ 8,306 TO 8,875 = 569' @ 60 FPH / 18K-26K WOB / 40/55 RPM ON TOP DRIVE / PUMP = 110 SPM @ 495 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2500/2300 PSI / MOTOR RPM = 109 RPM / TORQUE ON/OFF BOTTOM =6K2K / PU/SO/ROT WT. = 185/175/185/ / MUD WT 11.0 VIS 46 / NO MUD LOSS / NO PROBLEMS / MAX GAS 4,560 UNITS	
11/11/2010	0:00 - 15:00	15.00	DRLIN1	02	B	P		DRILL / SURVEY F/ 8,875' TO 9.541' = 666' @ 44.4 FPH / 18K-26K WOB / 40/55 RPM ON TOP DRIVE / PUMP = 110 SPM @ 495 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2900/2500 PSI / MOTOR RPM = 109 RPM / TORQUE ON/OFF BOTTOM =6K3K / PU/SO/ROT WT. = 200/185/195/ / MUD WT 11.8 VIS 46 / NO MUD LOSS / NO PROBLEMS / MAX GAS 6055 UNITS	
	15:00 - 15:30	0.50	DRLIN1	07	A	P		SERVICE RIG @ 9,541'	

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B			Spud Conductor: 9/27/2010				Spud Date: 9/29/2010	
Project: UTAH-UINTAH			Site: NBU 920-13B				Rig Name No: PROPETRO/, H&P 298/298	
Event: DRILLING			Start Date: 9/20/2010				End Date: 11/25/2010	
Active Datum: RKB @4,794.00ft (above Mean Sea Leve			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0					
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
	15:30 - 0:00	8.50	DRLIN1	02	B	P		DRILL / SURVEY F/ 9,541' TO 9,842' =301' @ 35.41FPH / 20K-28K WOB / 40/55 RPM ON TOP DRIVE / PUMP = 110 SPM @ 495 GPM / PUMP PRESSURE OFF/ON BOTTOM = 3000/2700 PSI / MOTOR RPM = 109 RPM / TORQUE ON/OFF BOTTOM =6K3K / PU/SO/ROT WT. = 200/185/195/ / MUD WT 12.5 VIS 46 / NO MUD LOSS / NO PROBLEMS / MAX GAS 5115 UNITS
11/12/2010	0:00 - 1:00	1.00	DRLIN1	05	C	P		CIRC BTM'S UP @ 9,842'
	1:00 - 6:00	5.00	DRLIN1	06	A	P		TOOH & L/D BIT & MUD MTR
	6:00 - 8:00	2.00	DRLIN1	06	A	P		P/U BIT & BHA # 2 W/ WEATHERFORD, SURFACE TEST SAME
	8:00 - 9:30	1.50	DRLIN1	06	A	P		TIH TO 2,890'
	9:30 - 10:00	0.50	DRLIN1	07	A	P		SERVICE RIG @ 2,890'
	10:00 - 13:30	3.50	DRLIN1	06	A	P		TIH W/ BHA#2 TO 9,662' WASH LAST 2 STDS TO BTM @ 9,842' / NO FILL / TIGHT HOLE @ 4,800' / 7,250' / 7,400' TRIP DRILL
	13:30 - 0:00	10.50	DRLIN1	02	B	P		DRILL / SURVEY F/ 9,842' TO 10,157' =315' @ 30 FPH / 20K-28K WOB / 40/55 RPM ON TOP DRIVE / PUMP = 100 SPM @ 450 GPM / PUMP PRESSURE OFF/ON BOTTOM = 3100/2800 PSI / MOTOR RPM = 72 RPM / TORQUE ON/OFF BOTTOM =8K3K / PU/SO/ROT WT. = 210/185/195/ / MUD WT 12.6 VIS 50 / NO MUD LOSS / NO PROBLEMS / MAX GAS 1785 UNITS
11/13/2010	0:00 - 17:30	17.50	DRLIN1	02	B	P		DRILL / SURVEY F/ 10,157' TO 10,484' =327' @ 18.68 FPH / 20K-28K WOB / 40/55 RPM ON TOP DRIVE / PUMP = 100 SPM @ 450 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2625/2460 PSI / MOTOR RPM = 72 RPM / TORQUE ON/OFF BOTTOM =8K3K / PU/SO/ROT WT. = 210/185/195/ / MUD WT 12.7 VIS 46 / NO MUD LOSS / NO PROBLEMS / MAX GAS 2,880 UNITS
11/14/2010	17:30 - 0:00	6.50	DRLIN1	06	A	P		PUMP SLUG / TOOH W/ BIT # 2 TO BHA
	0:00 - 1:00	1.00	DRLIN1	06	A	P		TOOH L/D BHA# 2
	1:00 - 1:30	0.50	DRLIN1	07	A	P		SERVICE RIG
	1:30 - 6:30	5.00	DRLIN1	06	A	P		TIH W/ BHA# 3 TO 10484' NO FILL ( WASH LAST 4 STDS TO BTM W/ NO PROBLEMS )
	6:30 - 12:00	5.50	DRLIN1	02	B	P		DRILL / SURVEY F/ 10484' TO 10,705' =221' @ 40.18 FPH / 20K-28K WOB / 40/55 RPM ON TOP DRIVE / PUMP = 100 SPM @ 450 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2950/2600 PSI / MOTOR RPM = 72 RPM / TORQUE ON/OFF BOTTOM =8K3K / PU/SO/ROT WT. = 210/190/200/ / MUD WT 12.8 VIS 46 / NO MUD LOSS / NO PROBLEMS / MAX GAS 4,180 UNITS
	12:00 - 13:30	1.50	DRLIN1	05	C	P		CIRC & CLEAN HOLE
	13:30 - 17:00	3.50	DRLIN1	06	E	P		WIPER TRIP F/ 10,705' TO 2,886' W/ NO PROBLEMS
11/15/2010	17:00 - 20:00	3.00	DRLIN1	06	E	P		TIH F/ 2,886' TO 10,705'
	20:00 - 22:30	2.50	DRLIN1	05	C	P		CIRC & COND MUD @ 10,705'
	22:30 - 0:00	1.50	DRLIN1	06	B	P		TOOH L/D DRILL PIPE TO RUN OPEN HOLE LOGS F/ 10705' TO 8,900'
	0:00 - 7:00	7.00	DRLIN1	06	B	P		TOOH LD DRILL STRING F/ 8,900 TO BIT W/ NO PROBLEMS
	7:00 - 13:30	6.50	DRLIN1	11	D	P		PJSM RU & RUN TRIPPLE COMBO LOGS W/ HALLIBURTON TO 10,706' BACK TO SURFACE W/ NO PROBLEMS
	13:30 - 14:00	0.50	DRLIN1	14	B	P		PULL WEAR BUSHING

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B			Spud Conductor: 9/27/2010				Spud Date: 9/29/2010	
Project: UTAH-UINTAH			Site: NBU 920-13B				Rig Name No: PROPETRO/, H&P 298/298	
Event: DRILLING			Start Date: 9/20/2010				End Date: 11/25/2010	
Active Datum: RKB @4,794.00ft (above Mean Sea Leve			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0					
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
11/16/2010	14:00 - 0:00	10.00	DRLIN1	12	C	P		PJSM R/U CASING CREW / PJSM / RUN 7" CSG/ CHECK FLOAT EQUIPMENT - OK ( SINGLE JT ELEVEVATORS TIGHT ON CSG SLOW GO ) RUN CSG TO 2,900'
	0:00 - 7:30	7.50	DRLIN1	12	A	P		RUN 7" CSG F/2,900 TO 7,400' ( INTERMITTENT RETURN F/ 2,900' TO 7,400' )
	7:30 - 9:30	2.00	DRLIN1	05	A	P		CIRC & CONDITION MUD @ 7,400'
	9:30 - 16:00	6.50	DRLIN1	12	A	P		CONTINUE TO RUN 7" CSG F/ 7,400' TO 10,705' ( CIRC EACH 500' TO GET MUD MOVING UP HOLE ) SHOE @ 10,694' FLOAT COLLAR @10,649' MARKER @ 5,171' LAND HANGER W/ 225K
	16:00 - 16:30	0.50	DRLIN1	05	A	P		CIRC W/ FULL RETURNS
	16:30 - 17:30	1.00	DRLIN1	12	A	P		RD CSG EQUIPMENT
	17:30 - 18:00	0.50	DRLIN1	12	B	P		PJSM / R/U HALLIBURTON CEMENT EQUIPMENT & CONTINUE TO CIRC / MAX GAS 4,380 UNITS
	18:00 - 0:00	6.00	DRLIN1	12	E	P		TEST PUMPS & LINES TO 5000 PSI / PUMP 75 BBLS H2O + 420 SX LEAD CEMENT @ 12.9 ppg (65/35 CLASS G / POZ + 0.5% ENCONOCLITE (SODIUM SILICATE ) + 4% GEL + 1% HR - 5 ) 151.8 BBLS FRESH WATER / (11.07 gal/sx, 2.03 yield) + 760 SX TAIL @ 14.5 ppg (CLS G 50/50 POZ + 125 LE HALAD-344 + 125 LB HALAD -322 + 3800 LB SILICALITE+ 2500 LB MICRO BOND HT) + 173.3 BBLS H2O / (5.5.46gal/sx, 1.28 yield) / DROP PLUG 8 DISPLACE W/407 BBLS H2O + ADDITIVES / PLUG DOWN @ 21:00 LIFT PRESSURE @ 3080 PSI BUMP PRESSURE @ 3650 / W/ 5 BBL CEMENT TO PIT & FULL RETURNS / FLOATS HELD W/ 6 BBLS H2O RETURNED TO INVENTORY / TOP OF TAIL CEMENT CALCULATED @ 4715' ,RD MO CMT EQUIP
11/17/2010	0:00 - 1:30	1.50	DRLPRO	14	B	P		INSTALL & SET 7" PACK OFF W/ WEATHERFORD / TEST SAME
	1:30 - 2:30	1.00	DRLPRO	15	A	P		PREPARE TO TEST BOP / INSTALL 3 1/2 IF SAVER SUB AND GRABBS ON TDS C/O PUMP LINERS TO 6"
	2:30 - 10:30	8.00	DRLPRO	15	A	P		TEST BOP & EQUIPMENT AS PER PROGRAM 500 LOW / 10,000 HIGH ( 500/5000 ON ANNULAR) TEST CSG TO 2320 PSI F/ 30 MINS
	10:30 - 11:00	0.50	DRLPRO	14	B	P		INSTALL WEAR BUSHING
	11:00 - 15:00	4.00	DRLPRO	06	A	P		P/U BHA W/ FRANKS PU MACHINE TO 1,037'
	15:00 - 15:30	0.50	DRLPRO	07	A	P		SERVICE RIG / ATTEMPT TO BREAK CIRC - NO GO
	15:30 - 16:30	1.00	DRLPRO	06	A	P		P/U 33 JTS OF 3 1/2" DP TO STD IN DRK ( TO DRILL 6 1/8" NEW HOLE )
	16:30 - 18:00	1.50	DRLPRO	06	A	X		TOOH & UNPLUG MUD MTR (CUTTINGS & LCM )
11/18/2010	18:00 - 0:00	6.00	DRLPRO	06	A	P		TIH W/ BHA & CONTINUE P/U 3 1/2" DP TO 4,500'
	0:00 - 6:30	6.50	DRLPRO	06	A	P		CONTINUE TO P/U 3 1/2" DRILL PIPE F/ 4,500 TO 10,621' TAG CEMENT
	6:30 - 8:00	1.50	DRLPRO	05	G	P		CIR & DISPLACE 7" CSG F/ WATER TO 12.9 PPG MUD @ 10,621'
	8:00 - 9:00	1.00	DRLPRO	09	A	P		CUT & SLIP 123' OF DRILL LINE
	9:00 - 9:30	0.50	DRLPRO	14	B	P		INSTALL ROTATING HEAD
	9:30 - 11:00	1.50	DRLPRO	02	F	P		DRILL CEMENT & SHOE TRACK F/ 10,621' TO 10,694' CLEAN OUT RAT HOLE TO 10,705'

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No: PROPETRO/, H&P 298/298
Event: DRILLING		Start Date: 9/20/2010		End Date: 11/25/2010	
Active Datum: RKB @4,794.00ft (above Mean Sea Leve		UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0			

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
	11:00 - 20:00	9.00	DRLPRO	02	B	P		DRILL / F/ 10,705' TO 10,828' =123' @ 13.66 FPH / 12K-16K WOB / 30-35 RPM ON TOP DRIVE / PUMP = 53 SPM @ 205 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2,375/2250 PSI / MOTOR RPM = 62 RPM / TORQUE ON/OFF BOTTOM =3K2K / PU/SO/ROT WT. = 170/160/1165/ / MUD WT 13.0 VIS 43 / NO MUD LOSS / NO PROBLEMS / MAX GAS 4,380 UNITS / BOP DRILL
	20:00 - 20:30	0.50	DRLPRO	07	A	P		SERVICE RIG @ 10,828'
	20:30 - 0:00	3.50	DRLPRO	02	B	P		DRILL / F/ 10,828' TO 10,870' = 42' @ 12 FPH / 12K-16K WOB / 30-35 RPM ON TOP DRIVE / PUMP = 53 SPM @ 205 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2,375/2250 PSI / MOTOR RPM = 62 RPM / TORQUE ON/OFF BOTTOM =3K2K / PU/SO/ROT WT. = 170/160/1165/ / MUD WT 13.4 VIS 43 / NO MUD LOSS / NO PROBLEMS / MAX GAS 500 UNITS / BOP DRILL
11/19/2010	0:00 - 18:00	18.00	DRLPRO	02	B	P		DRILL / F/ 10,870' TO 10,994' = 124' @ 6.88 FPH / 12K-18K WOB / 25-35 RPM ON TOP DRIVE / PUMP = 53 SPM @ 205 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2,375/2250 PSI / MOTOR RPM = 62 RPM / TORQUE ON/OFF BOTTOM =3K2K / PU/SO/ROT WT. = 175/165/1170/ / MUD WT 13.4 VIS 45 / 60 BBL MUD LOSS / NO OTHER PROBLEMS / MAX GAS 3650 UNITS (WORK TIGHT HOLE @ 10,970')
	18:00 - 23:30	5.50	DRLPRO	06	A	P		TOOH W/ BIT & MTR F/ 10,994 TO BIT/ LD SAME
	23:30 - 0:00	0.50	DRLPRO	07	A	P		SERVICE RIG
11/20/2010	0:00 - 0:30	0.50	DRLPRO	06	A	P		P/U NEW BIT # MTR / TEST SAME
	0:30 - 6:00	5.50	DRLPRO	06	A	P		TIH W/ BIT # 5 TO 10,705' W/ NO PROBLEMS
	6:00 - 7:30	1.50	DRLPRO	03	E	P		WASH & REAM F/ 10,705' TO 10,994'
	7:30 - 13:00	5.50	DRLPRO	02	B	P		DRILL / F/ 10,994' TO 11,037' = 43' @ 7.8 FPH / 10K-12K WOB / 25-35 RPM ON TOP DRIVE / PUMP = 50 SPM @ 200 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2,375/2250 PSI / MOTOR RPM = 64 RPM / TORQUE ON/OFF BOTTOM =3K2K / PU/SO/ROT WT. = 175/165/170/ / MUD WT 13.4 VIS 45 / 60 BBL MUD LOSS / NO OTHER PROBLEMS / MAX GAS 1635 UNITS 10% LCM
	13:00 - 13:30	0.50	DRLPRO	07	A	P		SERVICE RIG @ 11,037'
	13:30 - 0:00	10.50	DRLPRO	02	B	P		DRILL / F/ 11,037' TO 11,160' = 123' @ 12.3FPH / 12K-16K WOB / 25-40 RPM ON TOP DRIVE / PUMP = 53 SPM @ 200 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2,375/2250 PSI / MOTOR RPM = 67 RPM / TORQUE ON/OFF BOTTOM =3K2K / PU/SO/ROT WT. = 175/165/170/ / MUD WT 13.4 VIS 45 / 40 BBL MUD LOSS / NO OTHER PROBLEMS / MAX GAS2850 UNITS 11%LCM
11/21/2010	0:00 - 12:00	12.00	DRLPRO	02	B	P		DRILL / F/ 11,160' TO 11,320' = 160 @ 13.33FPH / 12K-16K WOB / 25-40 RPM ON TOP DRIVE / PUMP = 53 SPM @ 200 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2,475/2325 PSI / MOTOR RPM = 67 RPM / TORQUE ON/OFF BOTTOM =4K2K / PU/SO/ROT WT. = 175/165/170/ / MUD WT 13.4 VIS 45 / 40 BBL MUD LOSS / NO OTHER PROBLEMS / MAX GAS 4145 UNITS 11%LCM
	12:00 - 12:30	0.50	DRLPRO	07	A	P		SERVICE RIG @ 11,320'

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No: PROPETRO/, H&P 298/298
Event: DRILLING		Start Date: 9/20/2010			End Date: 11/25/2010
Active Datum: RKB @4,794.00ft (above Mean Sea Leve		UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0			

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
	12:30 - 0:00	11.50	DRLPRO	02	B			DRILL / F/ 11,320' TO 11,480' =160 @ 13.91 FPH / 12K-16K WOB / 25-40 RPM ON TOP DRIVE / PUMP = 53 SPM @ 200 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2,475/2325 PSI / MOTOR RPM = 67 RPM / TORQUE ON/OFF BOTTOM =4K2K / PU/SO/ROT WT. = 175/165/170 / MUD WT 13.4 VIS 45 / NO MUD LOSS / NO OTHER PROBLEMS / MAX GAS 4050 UNITS 12%LCM
11/22/2010	0:00 - 11:00	11.00	DRLPRO	02	B	P		DRILL / F/ 11,480' TO 11,620' =140 @ 12.72 FPH / 12K-16K WOB / 25-40 RPM ON TOP DRIVE / PUMP = 53 SPM @ 200 GPM / PUMP PRESSURE OFF/ON BOTTOM = 2,475/2325 PSI / MOTOR RPM = 67 RPM / TORQUE ON/OFF BOTTOM =4K2K / PU/SO/ROT WT. = 175/165/170 / MUD WT 13.5 VIS 42 / NO MUD LOSS / NO OTHER PROBLEMS / MAX GAS 2940 UNITS 12%LCM
	11:00 - 12:00	1.00	DRLPRO	06	E	P		WIPER TRIP F/ 11,620' TO 10,690' ( PUMP OUT )
	12:00 - 12:30	0.50	DRLPRO	07	A	P		SERVICE RIG @ 10,705
	12:30 - 13:00	0.50	DRLPRO	06	E	P		TIH F/ 10,705 TO 11,620' W/ NO PROBLEMS
	13:00 - 15:00	2.00	DRLPRO	05	C	P		CIRC 2 X BTM'S UP @ 11,620' MAX GAS 3170 UNITS
	15:00 - 20:30	5.50	DRLPRO	06	A	P		TOOH W/ BIT # 5 F/ 11,620' TO BIT L/D BIT & NTR ( PUMP SLUG & DROP 2" DRIFT W/ 100' PIG TAIL) RECOVER 2" DRIFT
	20:30 - 21:00	0.50	DRLPRO	14	B	P		PULL WEAR BUSHING
	21:00 - 0:00	3.00	DRLPRO	11	D	P		PJSM R/U & RUN OPEN HOLE LOGS WITH HALLIBURTON TO 11,610 LOGGERS DEPTH - DRILLERS DEPTH 11,620' (TRIPPLE COMBO) W/ NO PROBLEMS
11/23/2010	0:00 - 3:00	3.00	DRLPRO	11	D	P		TOOH W/TRIPPLE COMBO WIRE LINE LOGS & R/D SAME
	3:00 - 5:00	2.00	DRLPRO	12	A	P		PJSM R/U FRANKS CASING CREW
	5:00 - 17:00	12.00	DRLPRO	12	C	P		PJSM P/U & TIH W/ 1096' OG 4 1/2" LINER & FLOAT EQUIPMENT +WEATHERFORD PBR&TIE BACK+ WCSH HANGER&TSP WT SET PACKER TO 11,620' TAG P/U FOR SPACE OUT SHOE @ 11,618' / LANDING COLLAR @ 11,571' PKR @ 10,510' & TOL @ 10,494'
	17:00 - 17:30	0.50	DRLPRO	05	A	P		CIRC HOLE CLEAN
	17:30 - 18:00	0.50	DRLPRO	12	C	P		PJSM W/ WEATHERFORD SET HANGER LOOSE 1OK IN LINER WT - OK
	18:00 - 18:30	0.50	DRLPRO	12	B	P		PJSM W/ HALLIBURTON CEMENTERS
	18:30 - 19:00	0.50	DRLPRO	12	B	P		RU HALLIBURTON EQUIPMENT
	19:00 - 23:00	4.00	DRLPRO	22	L	Z		HALLIBURTON ELECTRONICS SYSTEM DOWN/ W/O HALLIBURTON CEMENT TRUCK/ BRK CIRC SEVERAL TIMES
	23:00 - 0:00	1.00	DRLPRO	12	E	P		TEST HALLIBURTON LINES TO 5K PUMP 40 BBL WATER / CEMENT W/ 22 BBL 14.5 PPG SLURRY CEMENT /1.27 YIELD/ 9.41 GAL SK / 90 SK 50/50 POZ
11/24/2010	0:00 - 1:00	1.00	DRLPRO	12	E	P		DROP WIPER PLUG/ DISPLACE W/ 3 BBL WATER / 92.5 BBL 13.6 PPG MUD/ DID NOT BUMP PLUG/ 1/2 BBL BACK/ FLOATS HELD LIFT PRESSURE 1000 PSI 70' CMT ON TOP OF LINER
	1:00 - 1:30	0.50	DRLPRO	12	C	P		SET WEATHERFORD TSP PKR W/ WEATHERFORD/ SHEAR OFF W/ 40K
	1:30 - 2:30	1.00	DRLPRO	05	C	P		LD CMT HEAD PULL 1 STD REVERSE OUT W/ 120 BBL @ 60 SPM W/ 1400 PSI
	2:30 - 3:00	0.50	DRLPRO	12	B	P		R/D HALLIBURTON CEMENT EQUIPMENT



**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B			Spud Conductor: 9/27/2010				Spud Date: 9/29/2010	
Project: UTAH-UINTAH			Site: NBU 920-13B				Rig Name No: PROPETRO/, H&P 298/298	
Event: DRILLING			Start Date: 9/20/2010				End Date: 11/25/2010	
Active Datum: RKB @4,794.00ft (above Mean Sea Leve			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0					
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
	3:00 - 16:00	13.00	DRLPRO	06	A	P		PJSM / R/U LD MACHINE & LD 3 1/2" DRILL PIPE F/ 10,500'/ RUN DP & BHA OUT OF DERRICK/ LD SAME/ LOAD OUT 31/2 DP & BHA
	16:00 - 18:00	2.00	CSG	14	A	P		NIPPLE DOWN / SUPER CHOKE & CHOKE MANIFOLD / LOAD OUT SUPER CHOKE & PANEL/LOAD OUT CHOKE MANIFOLD & 31/2 HANDLING TOOLS
	18:00 - 0:00	6.00	CSG	14	A	P		NIPPLE DOWN 10K RENTAL BOP ,REMOVE ROTATING HEAD ,ANNULAR,DOUBLE GATE,
11/25/2010	0:00 - 2:00	2.00	CSG	14	A	P		ND BOP / SET OUT MUD CROSS / SINGLE BOP/LOAD OUT SAME

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B	Spud Conductor: 9/27/2010	Spud Date: 9/29/2010
Project: UTAH-UINTAH	Site: NBU 920-13B	Rig Name No: PROPETRO/, H&P 298/298
Event: DRILLING	Start Date: 9/20/2010	End Date: 11/25/2010
Active Datum: RKB @4,794.00ft (above Mean Sea Leve		
UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
	2:00 - 6:00	4.00	CSG	14	A	P		<p>WEATHERFORD WELL HEAD JOL / JUAN/ REMOVE B SECTION / SPLIT PACK OFF/ STAB 11"5KX 71/16 10K TUBING HEAD /TORQUE UP /TEST VOID TO 5000 PSI F/10 MIN / INSTALL NIGHT CAP/ RELEASE RIG @ 0600 HRS 11/25/2010 TO NBU 922-29G4AS</p> <p>CONDUCTOR CASING: Cond. Depth set: 40 Cement sx used: 28</p> <p>SPUD DATE/TIME: 8/31/2010 13:00 PM</p> <p>SURFACE HOLE: Surface From depth:40 Surface To depth: 2,864 Total SURFACE hours: 49.00 Surface Casing size:11 7/8 # of casing joints ran: 66 Casing set MD:2,846.0 # sx of cement:605 Cement blend (ppg):11/15.8/15.8 Cement yield (ft3/sk): 3.85/1.15/1.15 # of bbls to surface: 17 Describe cement issues: 17BBLS CMT TO SURFACE /FELL BACK 175 SKS/ 35 BBLS TOP OUT Describe hole issues: NONE</p> <p>PRODUCTION: Rig Move/Skid start date/time: 11/4/2010 0:00 Rig Move/Skid finish date/time:11/6/2010 14:00 Total MOVE hours: 62.0 Prod Rig Spud date/time: 11/7/2010 14:00 Rig Release date/time: 11/25/2010 6:00 Total SPUD to RR hours:424.0 Planned depth MD 11,620 Planned depth TVD 11,620 Actual MD: 11,620 Actual TVD: 11,616 Open Wells \$: \$1,932,769 AFE \$: \$1,056,442 Open wells \$/ft:\$166.33</p> <p>PRODUCTION HOLE: Prod. From depth: 2,886 Prod. To depth:11,620 Total PROD hours: 218.5 Log Depth: 11,610 Production Casing size: 4 1/2" liner # of casing joints ran: 25 Casing set MD:11,618.0 # sx of cement:90 Cement blend (ppg):14.5 Cement yield (ft3/sk): 1.27 Est. TOC (Lead &amp; Tail) or 2 Stage : 10419 Describe cement issues: FULL RETURNS DID NOT BUMP PLUG FLOATS HELD 1/2 BBL BACK TO INVENTORY Describe hole issues: GOOD</p>

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No: PROPETRO/, H&P 298/298
Event: DRILLING		Start Date: 9/20/2010		End Date: 11/25/2010	
Active Datum: RKB @4,794.00ft (above Mean Sea Leve		UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0			

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
								DIRECTIONAL INFO: VERTICAL KOP: Max angle: 2.31 Departure: Max dogleg MD:

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B			Spud Conductor: 9/27/2010			Spud Date: 9/29/2010		
Project: UTAH-UINTAH			Site: NBU 920-13B				Rig Name No: SWABBCO 1/1	
Event: COMPLETION			Start Date: 12/21/2010				End Date: 1/12/2011	
Active Datum: RKB @4,794.00ft (above Mean Sea Leve			UWI: NW/NE/O/9/S/20/E/13/O/0/26/PM/N/925/E/0/1555/O/0					
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
12/20/2010	7:00 - 7:15	0.25	COMP	48		P		TIRE CHAINS & SNOW SAFETY
	7:15 - 17:00	9.75	COMP	30		P		RIG DOWN RIG FROM 1022-3G3T MOVE RIG & EQUIP TO 920 13B W/ ASSISTENCE OF GRADER DUE TO DEEP SNOW TOOK ALL DAY
12/21/2010	7:00 - 7:15	0.25	COMP	48		P		JSA= RU SAFETY
	7:15 - 17:00	9.75	COMP	30		P		RU RIG ND WELL HEAD NU BOPS RU FLOOR & TUBING EQUIP NU RIG PUMP & LINES TALLEY & PU 139 JNTS EOT 4401' EST REV CIRC, CIRC DILLING MUD TO FBT, DIPLACING W/ TMAC CONTINUE TO RIH TO 7500' POOH 10 JNTS TO 7284' SDFW
12/27/2010	7:00 - 7:15	0.25	COMP	48		P		JSA= PUMP PRESS
	7:15 - 8:00	0.75	COMP	30		P		RIG AIR FROZEN
	8:00 - 17:00	9.00	COMP	30		P		O PSI ON WELL RIH 10 JNTS eot @ 7500' EST CIRC CIRC MUD TO FBT CONTINUE TO RIH TAG @ 10605' CIRC MUD TO FBT C/O TO 11229' SWIVEL EACH JNT DOWN CIRC HOLE CLEAN POOH 10 JNTS EOT @ 11000' SWIFN
12/28/2010	7:00 - 7:15	0.25	COMP	48		P		JSA= LD TUBING
	7:15 - 17:30	10.25	COMP	30		P		O PSI ON WELL RIH TAG @ 11229' RU PWR SWVL C/ & DRILL TO PBTD @ 11565' CIRC CLEAN RD PWR SWVL POOH LD TUBING LD BHA RD FLOOR & TUBING EQUIP ND BOPS NU FRAC VALVES PREP TO RD IN AM SWIFN
1/6/2011	7:00 - 7:15	0.25	COMP	48		P		JSA= W/L SAFETY
	7:15 - 17:00	9.75	COMP	30		P		RU RIG SPOT EQUIP MIRU CUTTERS W/L RUN CBL, FILL HOLE W/ TMAC NU B&C QUICK TEST, TEST CASING & FRAC VALVES TO 8950 PSI NU TO SURFACE TEST TO 900 PSI, RU CUTTERS PU RIH W/ 3-3/8" EXPEND PERF GUN W/ 23 GM, 0.36" HOLE & PERF MESA VERDE
								11449'-11452' 4 SPF, 90* PH, 12 HOLES 11439'-11442', 4 SPF, 90* PH, 12 HOLES 11423'-11425', 4 SPF, 90* PH, 8 HOLES (32 HOLES) SHUT WELL IN WAIT ON SUPERIOR FRAC CREW SDFN
1/7/2011	7:00 - 15:00	8.00	COMP	30		P		STANDBY WAITING ON SUPERIOR
1/9/2011	6:00 - 6:15	0.25	COMP	48		P		JSA= FRACING

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No: SWABBCO 1/1
Event: COMPLETION		Start Date: 12/21/2010		End Date: 1/12/2011	
Active Datum: RKB @4,794.00ft (above Mean Sea Leve		UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0			

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
	6:15 - 19:00	12.75	COMP	30		P		MIRU SUPERIOR FRAC EQUIP FRAC STAGE #1MESA VERDE 11423'-11452' (32 HOLES)  STAGE #1] WHP= 2690# , BRK DN PERFS @ 4323# , INJ RT=52.5 , INJ PSI=5765# , ISIP=3821# , FG=.78 , (FRAC) MP= 8444# , MR= 53.4 , AP=5924# , AR= 50.1 , FG=.80 , ISIP= 4080# , NPI=259# , PUMPED 3443 BBLs SLK WTR W/73620 # 30/50 MESH PRIME PLUS, W/22/32 CALC PERFS OPEN 69%.  STAGE #2] P/U RIH W/ HALLI 10K CBP & PERF GUN, SET CBP @ , PERF MESA VERDE USING 3-3/8" EXPEND, 23 GM, 0.36" HOLE  11318'-11320' , 4 SPF, 90* PH, 8 HOLES, BRK DWN @ 5657# , ISIP= 3840# FG= .78 11306'-11308' , 3 SPF, 120* PH, 6 HOLES 11255'-11257' , 3 SPF, 120* PH, 6 HOLES 11240'-11242' , 3 SPF, 120* PH, 6 HOLES 11218'-11220' , 3 SPF, 120* PH, 6 HOLES (32 HOLES)  WHP= 3405# , BRK DN PERFS @ 3667 , INJ RT= 52.9 , INJ PSI= 5238# , ISIP= 3588# , FG= .76 , (FRAC) MP=8587# , MR= 55.5 , AP= 5254# , AR= 52.1 , FG=.78 , ISIP= 3840# , NPI= 252# , PUMPED 6109 BBLs SLK WTR W/166408 # 30/50 MESH TLC, W/ 24/32 CALC PERFS OPEN 77%.  LOAD LINES & WH W/ BRINE WTR TO PREVENT FREEZING SDFN JSA= FRAC & PERF
1/10/2011	6:00 - 6:15	0.25	COMP	48		P		
	6:15 - 15:00	8.75	COMP	30		P		STAGE #3] P/U RIH W/ HALLI 10K CBP & PERF GUN, SET CBP @11190' , PERF MESA VERDE USING 3-3/8" EXPEND, 23 GM, 0.36" HOLE. 11165'-11167' , 4 SPF, 90* PH, 8 HOLES 11159'-11162' , 4 SPF, 90* PH, 12 HOLES 11151'-11154' , 4 SPF, 90* PH, 12 HOLES ( 32 HOLES)  WHP= 2327# , BRK DN PERFS @ 4739# , INJ RT= , INJ PSI= , ISIP=4211# , FG=.82 , (FRAC) MP=8838# , MR= 51.8 , AP= 6027# , AR= 49.8 , FG= , ISIP= , NPI= , PUMPED2723 BBLs SLK WTR W/ 62400 # 30/50 MESH TLC, W/ 25/32 CALC PERFS OPEN 77 %. SCREENED OFF W/ 2275 BBLs OF2753 BBLs PUMPED GOT 46000# OF 73391# SAND IN PERFS FLOW BACK 30 MIN FL CLEAN TRY TO PUMP FLUSH 30 BBLs 8900# FLOW WELL 80 MIN JUST TRACE Snd PUMP 200 BBLs SCREENED OFF AGAIN PU RIH W/ KILL PLG SET @ 10514' FRAC EQUIP IN WAY OF TUBING @ BOPS SDFN LEAVE HTR ON FRAC VALVES JSA= PICK UP TUBING
1/11/2011	7:00 - 7:15	0.25	COMP	48		P		



**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B	Spud Conductor: 9/27/2010	Spud Date: 9/29/2010
Project: UTAH-UINTAH	Site: NBU 920-13B	Rig Name No: SWABBCO 1/1
Event: COMPLETION	Start Date: 12/21/2010	End Date: 1/12/2011
Active Datum: RKB @4,794.00ft (above Mean Sea Leve		
UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
	7:15 - 17:00	9.75	COMP	30		P		0 PSI ON WELL JELLED FUEL COULDNT GET EQUIP RUNNING TILL 11:00 AM ND FRAC VALVES NU BOPS SPOT IN TUBING RU FLOOR & TUBING EQUIP PU 322 JNTS TAG SAND @10200' RU PWR SWVL & DRILLING HEAD PREP TO DRILL SDFN JSA=PRESS CONTROL THAW OUT FROZEN LINES & FROZEN EQUIP
1/12/2011	7:00 - 9:00	2.00	COMP	48		P		EST CIRC PRESS TEST TO 4000# C/O SAND FROM 10200' TO 10514' SAND BRIDGES
	9:00 - 18:00	9.00	COMP	30		P		PLUG #1] DRILL THRU HALLI 10K CBP @ 10514' IN 15 MIN W/O # INCREASE CIRC 15 MIN
								PLUG #2] CONTINUE TO RIH TAG SAND @ 11175' (15' FILL) C/O & DRILL THRU HALLI 10K CBP @ 11190' IN 20 MIN W/ 500 # INCREASE
								PLUG #3] CONTINUE TO RIH TAG SAND @ 11325' (24' FILL) C/O & DRILL THRU HALLI 10K CBP @ 11349' IN 20 MIN W/ 300# INCREASE ( W/ 800# ON WELL)
								CONTINUE TO RIH TAG SAND @ 11471' ( 100' FILL) C/O & DRILL TO PBTD @ 11571' CIRC CLEAN LD 2 JNTS RD PWR SWVL TUBING STUCK NU PUMP ON TUBING EST CIRC CIRC WELL RU PWR SWVL WORK TUBING & CIRC TUBING WONT MOVE DROP BALL TO PUMP OFF BIT PUMP 120 BBLS NO PRESS SUSPECT PUMPING AROUND BALL CALL SLICKLINE TRUCK TO CHASE BALL, RU SLICKLINE TRK RIH W/ INPRESION BLOCK TAG @ 10543' JAR LOOSE POOH SUSPECT CRIMPED JNT, EOT @ 11498' OPEN WELL TO SALES SHUT DOWN FOR NIGHT.
								(PLAN TO SALE WELL OVERNIGHT CONTROL WELL W/ BRINE WTR IN AM CUT TUBING W/ W/L POOH LAND TUBING ON HNGR RDMO AFTER APPROVAL)
	17:30 - 17:30	0.00	PROD					WELL TURNED TO SALES @ 17:30 HR ON 1/12/11 - 2600 MCFD, 2400 BWPD, CP 2293#, FTP 1945, CK 24/64"
1/13/2011	7:00 - 7:15	0.25	COMP	48		P		WELL CONTROL

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B	Spud Conductor: 9/27/2010	Spud Date: 9/29/2010
Project: UTAH-UINTAH	Site: NBU 920-13B	Rig Name No: SWABBCO 1/1
Event: COMPLETION	Start Date: 12/21/2010	End Date: 1/12/2011
Active Datum: RKB @4,794.00ft (above Mean Sea Level) UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (ft)	Operation
	7:15 - 17:00	9.75	COMP	30		P		<p>WELL ON SALES 1800# OPEN TO PIT TO BLOW DOWN 1 HR PSI @ 300# RU RIG PMP PUMP 200 BBLS 10# BRINE DWN ANN WELL PSI 1200# OPEN ANN TO PIT NU TO TUBING PMP 20 BBLS TMAC RU RIH W/ W/L CHEM CUTTER TAG @ 10559' PULL UP TO 10533' W/L, CUT IN MIDDLE OF NEXT JNT 31' ABOVE TIGHT SPOT POOH W/ W/L PULLON TUBING, FREE LD 1 JNT LAND TUBING ON HNGR W/ 332 JNTS EOT @ 10530' ( NO XN NPL ATTACHED) FISH TOP @ 10533' W/L DEPTH) RD FLOOR &amp; TUBING EQUIP ND BOPS PMP 20 BBLS BRINE DWN TUB B/O STRING FLOAT NU WELLHEAD SHUT IN WELL WELL PSI= 2800# TUB 1900# CASING, TURN WELL OVER TO FBC W/ TOTAL PUMPED= 12275 BBLS RIG REC= 2000 BBLS LEFT TO REC= 10275BBLS LESS WHAT WAS SOLD LAST NIGHT</p> <p>TUBING DETAIL K.B.= 26.00 HNGR= 1.00 332 JNTS 2-3/8" L-80= 10503.38 (TUB CUT NO XN NPL)</p> <p>FISH = 30 JNTS 2-3/8" L-80 F/T @ 10533' ,EOT @ 11498' S.N POBS &amp; 3-7/8" BIT</p> <p>CTAP DEL=374 JNTS IN WELL= 362 JNTS RETURNED= 12 JNTS</p>
	7:00 -			33	A			7 AM FLBK REPORT: CP 1925#, TP -#, 24/64" CK, 58 BWPH, MED SAND, 3.2 GAS TTL BBLS RECOVERED: 2831 BBLS LEFT TO RECOVER: 9444
1/14/2011	7:00 -			33	A			7 AM FLBK REPORT: CP 2950#, TP 2050#, 20/64" CK, 35 BWPH, MED SAND, 2.4 GAS TTL BBLS RECOVERED: 3545 BBLS LEFT TO RECOVER: 8730
1/15/2011	7:00 -			33	A			7 AM FLBK REPORT: CP 2750#, TP 1925#, 20/64" CK, 17 BWPH, LIGHT SAND, 2.7 GAS TTL BBLS RECOVERED: 4069 BBLS LEFT TO RECOVER: 8206
1/16/2011	7:00 -			33	A			7 AM FLBK REPORT: CP 2650#, TP 1800#, 20/64" CK, 13 BWPH, LIGHT SAND, 2.8 GAS TTL BBLS RECOVERED: 4432 BBLS LEFT TO RECOVER: 7843
1/17/2011	7:00 -			33	A			7 AM FLBK REPORT: CP 2575#, TP 1650#, 20/64" CK, 14 BWPH, LIGHT SAND, 2.6 GAS TTL BBLS RECOVERED: 4813 BBLS LEFT TO RECOVER: 7462
1/18/2011	7:00 -			33	A			7 AM FLBK REPORT: CP 2450#, TP 1600#, 20/64" CK, 12 BWPH, LIGHT SAND, 2.6 GAS TTL BBLS RECOVERED: 5185 BBLS LEFT TO RECOVER: 7090

## 1 General

### 1.1 Customer Information

Company	US ROCKIES REGION
Representative	
Address	

### 1.2 Well Information

Well	NBU 920-13B	Wellbore No.	OH
Well Name	NBU 920-13B	Common Name	NBU 920-13B
Project	UTAH-UINTAH	Site	NBU 920-13B
Vertical Section Azimuth	166.66 (°)	North Reference	True
Origin N/S	0.0 (ft)	Origin E/W	0.0 (ft)
Spud Date	9/29/2010	UWI	NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/155 5/0/0
Active Datum	RKB @4,794.00ft (above Mean Sea Level)		

## 2 Survey Name

### 2.1 Survey Name: SURFACE

Survey Name	SURFACE	Company	PROPETRO
Started	9/29/2010	Ended	
Tool Name	TOT	Engineer	Anadarko

#### 2.1.1 Tie On Point

MD (ft)	Inc (°)	Azi (°)	TVD (ft)	N/S (ft)	E/W (ft)
22.00	0.00	0.00	22.00	0.00	0.00

#### 2.1.2 Survey Stations

Date	Type	MD (ft)	Inc (°)	Azi (°)	TVD (ft)	N/S (ft)	E/W (ft)	V. Sec (ft)	DLeg (°/100ft)	Build (°/100ft)	Turn (°/100ft)	TFace (°)
9/29/2010	Tie On	22.00	0.00	0.00	22.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
9/29/2010	NORMAL	522.00	0.75		521.99	3.27	0.00	-3.18	0.15	0.15	0.00	0.00
	NORMAL	1,052.00	1.00		1,051.92	11.37	0.00	-11.06	0.05	0.05	0.00	0.00
9/30/2010	NORMAL	1,562.00	0.75		1,561.86	19.15	0.00	-18.64	0.05	-0.05	0.00	180.00
10/1/2010	NORMAL	2,072.00	0.75		2,071.82	25.83	0.00	-25.13	0.00	0.00	0.00	0.00
	NORMAL	2,582.00	1.00		2,581.76	33.62	0.00	-32.71	0.05	0.05	0.00	0.00
10/2/2010	NORMAL	2,642.00	1.00		2,641.75	34.67	0.00	-33.73	0.00	0.00	0.00	0.00

### 2.2 Survey Name: Survey #1

Survey Name	Survey #1	Company	WEATHERFORD
Started	11/7/2010	Ended	
Tool Name	MWD	Engineer	Anadarko

#### 2.2.1 Tie On Point

MD (ft)	Inc (°)	Azi (°)	TVD (ft)	N/S (ft)	E/W (ft)
2,950.00	1.39	168.59	2,949.71	-35.07	7.08

## 2.2.2 Survey Stations

Date	Type	MD (ft)	Inc (°)	Azi (°)	TVD (ft)	N/S (ft)	E/W (ft)	V. Sec (ft)	DLeg (°/100ft)	Build (°/100ft)	Turn (°/100ft)	TFace (°)
11/7/2010	Tie On	2,950.00	1.39	168.59	2,949.71	-35.07	7.08	35.76	0.00	0.00	0.00	0.00
11/7/2010	NORMAL	3,045.00	1.50	172.62	3,044.68	-37.43	7.47	38.15	0.16	0.12	4.24	44.76
	NORMAL	3,139.00	1.06	206.12	3,138.66	-39.43	7.24	40.04	0.90	-0.47	35.64	136.48
	NORMAL	3,234.00	1.19	228.24	3,233.64	-40.88	6.12	41.19	0.47	0.14	23.28	84.59
	NORMAL	3,329.00	1.19	227.24	3,328.62	-42.21	4.66	42.14	0.02	0.00	-1.05	-90.50
11/8/2010	NORMAL	3,424.00	1.25	224.74	3,423.60	-43.61	3.21	43.18	0.08	0.06	-2.63	-42.83
	NORMAL	3,519.00	1.31	226.87	3,518.57	-45.09	1.68	44.26	0.08	0.06	2.24	39.48
	NORMAL	3,613.00	1.63	226.24	3,612.54	-46.75	-0.07	45.47	0.34	0.34	-0.67	-3.21
	NORMAL	3,708.00	0.88	252.87	3,707.52	-47.90	-1.74	46.21	0.98	-0.79	28.03	154.93
	NORMAL	3,803.00	1.06	251.24	3,802.51	-48.40	-3.27	46.34	0.19	0.19	-1.72	-9.53
	NORMAL	3,898.00	0.88	237.12	3,897.49	-49.08	-4.71	46.66	0.31	-0.19	-14.86	-133.90
	NORMAL	3,992.00	1.25	228.99	3,991.48	-50.14	-6.09	47.38	0.42	0.39	-8.65	-26.31
	NORMAL	4,087.00	1.13	220.12	4,086.46	-51.54	-7.48	48.42	0.23	-0.13	-9.34	-127.46
	NORMAL	4,182.00	1.06	220.12	4,181.44	-52.92	-8.65	49.50	0.07	-0.07	0.00	180.00
	NORMAL	4,277.00	1.19	204.74	4,276.42	-54.49	-9.63	50.80	0.34	0.14	-16.19	-74.52
	NORMAL	4,372.00	1.25	188.62	4,371.40	-56.41	-10.19	52.54	0.37	0.06	-16.97	-88.21
	NORMAL	4,466.00	1.38	180.24	4,465.37	-58.56	-10.35	54.59	0.25	0.14	-8.91	-60.18
	NORMAL	4,656.00	1.00	167.12	4,655.33	-62.46	-9.99	58.47	0.24	-0.20	-6.91	-150.80
	NORMAL	4,750.00	1.50	159.47	4,749.31	-64.41	-9.38	60.51	0.56	0.53	-8.14	-22.31
	NORMAL	4,845.00	1.06	173.37	4,844.29	-66.45	-8.84	62.62	0.56	-0.46	14.63	151.61
	NORMAL	4,940.00	1.38	172.87	4,939.27	-68.46	-8.60	64.63	0.34	0.34	-0.53	-2.16
	NORMAL	5,035.00	1.56	174.62	5,034.23	-70.88	-8.33	67.05	0.20	0.19	1.84	14.88
	NORMAL	5,129.00	1.75	174.62	5,128.20	-73.58	-8.08	69.74	0.20	0.20	0.00	0.00
	NORMAL	5,224.00	1.31	189.74	5,223.16	-76.10	-8.13	72.17	0.62	-0.46	15.92	144.85
	NORMAL	5,319.00	1.31	200.62	5,318.14	-78.19	-8.69	74.07	0.26	0.00	11.45	95.44
	NORMAL	5,414.00	1.50	189.24	5,413.11	-80.43	-9.28	76.12	0.35	0.20	-11.98	-61.52
	NORMAL	5,508.00	1.38	191.24	5,507.08	-82.75	-9.69	78.29	0.14	-0.13	2.13	158.27
	NORMAL	5,603.00	1.50	181.49	5,602.05	-85.12	-9.95	80.53	0.29	0.13	-10.26	-68.83
	NORMAL	5,698.00	1.50	185.62	5,697.02	-87.60	-10.10	82.91	0.11	0.00	4.35	92.06
	NORMAL	5,793.00	1.81	180.74	5,791.98	-90.34	-10.24	85.54	0.36	0.33	-5.14	-26.90
	NORMAL	6,172.00	1.94	188.37	6,170.80	-101.87	-10.89	96.61	0.36	0.26	7.89	47.33
11/9/2010	NORMAL	5,888.00	1.63	178.37	5,886.93	-93.19	-10.23	88.32	0.20	-0.19	-2.49	-159.62
	NORMAL	5,982.00	1.81	188.12	5,980.89	-95.99	-10.40	91.01	0.36	0.19	10.37	63.34
	NORMAL	6,077.00	1.69	180.87	6,075.85	-98.88	-10.63	93.76	0.26	-0.13	-7.63	-122.05
	NORMAL	6,267.00	1.69	178.74	6,265.75	-104.86	-11.09	99.48	0.41	-0.26	-10.14	-134.09
	NORMAL	6,361.00	1.94	181.62	6,359.71	-107.84	-11.10	102.37	0.28	0.27	3.06	21.49
	NORMAL	6,456.00	1.69	178.62	6,454.66	-110.85	-11.12	105.29	0.28	-0.26	-3.16	-160.68
	NORMAL	6,551.00	1.81	184.37	6,549.61	-113.74	-11.20	108.09	0.22	0.13	6.05	58.55
	NORMAL	6,645.00	2.00	180.37	6,643.56	-116.86	-11.32	111.10	0.25	0.20	-4.26	-37.00
	NORMAL	6,740.00	2.00	180.87	6,738.50	-120.18	-11.36	114.32	0.02	0.00	0.53	90.25
	NORMAL	6,835.00	1.88	174.74	6,833.45	-123.39	-11.24	117.47	0.25	-0.13	-6.45	-123.08
	NORMAL	6,929.00	2.19	170.24	6,927.39	-126.69	-10.79	120.79	0.37	0.33	-4.79	-29.53
	NORMAL	7,024.00	2.31	170.49	7,022.32	-130.37	-10.17	124.51	0.13	0.13	0.26	4.80
	NORMAL	7,119.00	2.31	171.87	7,117.24	-134.15	-9.58	128.33	0.06	0.00	1.45	90.69
	NORMAL	7,214.00	2.25	179.74	7,212.16	-137.91	-9.30	132.05	0.34	-0.06	8.28	104.76
	NORMAL	7,308.00	2.19	178.74	7,306.09	-141.56	-9.25	135.60	0.08	-0.06	-1.06	-147.65
	NORMAL	7,403.00	2.19	171.12	7,401.02	-145.16	-8.93	139.19	0.31	0.00	-8.02	-93.81
	NORMAL	7,498.00	2.19	169.62	7,495.96	-148.74	-8.33	142.81	0.06	0.00	-1.58	-90.75
	NORMAL	7,593.00	2.19	169.87	7,590.89	-152.31	-7.68	146.43	0.01	0.00	0.26	90.12
	NORMAL	7,687.00	2.19	169.87	7,684.82	-155.85	-7.05	150.02	0.00	0.00	0.00	0.00
11/10/2010	NORMAL	7,782.00	2.19	167.24	7,779.75	-159.41	-6.33	153.65	0.11	0.00	-2.77	-91.31
	NORMAL	7,930.00	2.25	174.62	7,927.64	-165.06	-5.43	159.35	0.20	0.04	4.99	81.85
	NORMAL	7,972.00	2.13	170.74	7,969.61	-166.65	-5.23	160.95	0.45	-0.29	-9.24	-130.91
	NORMAL	8,066.00	2.19	167.74	8,063.54	-170.13	-4.57	164.49	0.14	0.06	-3.19	-63.55
	NORMAL	8,161.00	1.94	164.74	8,158.48	-173.45	-3.76	167.91	0.29	-0.26	-3.16	-158.11
	NORMAL	8,256.00	2.13	161.99	8,253.42	-176.68	-2.79	171.28	0.22	0.20	-2.89	-28.58
	NORMAL	8,350.00	2.13	165.49	8,347.35	-180.04	-1.81	174.76	0.14	0.00	3.72	91.75

## 2.2.2 Survey Stations (Continued)

Date	Type	MD (ft)	Inc (°)	Azi (°)	TVD (ft)	N/S (ft)	E/W (ft)	V. Sec (ft)	DLeg (°/100ft)	Build (°/100ft)	Turn (°/100ft)	TFace (°)
11/10/2010	NORMAL	8,443.00	2.06	158.37	8,440.29	-183.26	-0.76	178.14	0.29	-0.08	-7.66	-108.59
	NORMAL	8,540.00	1.81	157.24	8,537.24	-186.30	0.47	181.38	0.26	-0.26	-1.16	-171.89
	NORMAL	8,635.00	1.63	147.74	8,632.19	-188.82	1.78	184.14	0.35	-0.19	-10.00	-126.95
	NORMAL	8,729.00	1.81	143.37	8,726.15	-191.14	3.37	186.77	0.24	0.19	-4.65	-38.28
	NORMAL	8,824.00	1.25	149.74	8,821.12	-193.24	4.79	189.14	0.62	-0.59	6.71	166.27
11/11/2010	NORMAL	8,919.00	1.69	164.74	8,916.09	-195.49	5.68	191.53	0.61	0.46	15.79	48.83
	NORMAL	9,014.00	1.81	158.49	9,011.04	-198.24	6.60	194.41	0.24	0.13	-6.58	-60.99
	NORMAL	9,108.00	1.88	153.49	9,104.99	-201.00	7.83	197.38	0.19	0.07	-5.32	-69.01
	NORMAL	9,203.00	1.81	159.24	9,199.94	-203.80	9.06	200.39	0.21	-0.07	6.05	113.57
	NORMAL	9,298.00	2.00	154.62	9,294.89	-206.70	10.30	203.50	0.26	0.20	-4.86	-41.27
	NORMAL	9,393.00	1.75	150.74	9,389.84	-209.46	11.72	206.51	0.29	-0.26	-4.08	-155.01
	NORMAL	9,488.00	1.56	140.37	9,484.80	-211.72	13.26	209.07	0.37	-0.20	-10.92	-127.50
	NORMAL	9,582.00	1.31	145.99	9,578.77	-213.60	14.67	211.22	0.30	-0.27	5.98	153.41
	NORMAL	9,677.00	1.19	144.74	9,673.75	-215.30	15.85	213.15	0.13	-0.13	-1.32	-167.82
	NORMAL	9,772.00	1.13	141.87	9,768.73	-216.84	17.00	214.92	0.09	-0.06	-3.02	-137.35
11/12/2010	NORMAL	9,866.00	0.94	145.62	9,862.71	-218.21	18.01	216.48	0.21	-0.20	3.99	162.25
	NORMAL	9,961.00	0.88	157.12	9,957.70	-219.53	18.73	217.93	0.20	-0.06	12.11	113.88
	NORMAL	10,056.00	1.00	150.24	10,052.69	-220.92	19.43	219.44	0.17	0.13	-7.24	-46.72
	NORMAL	10,149.00	1.00	149.24	10,145.67	-222.32	20.24	220.99	0.02	0.00	-1.08	-90.50
11/13/2010	NORMAL	10,245.00	1.13	115.99	10,241.66	-223.45	21.52	222.39	0.65	0.14	-34.64	-95.07
11/14/2010	NORMAL	10,705.00	1.13	115.99	10,701.57	-227.43	29.68	228.14	0.00	0.00	0.00	0.00
11/22/2010	NORMAL	11,165.00	1.13	115.99	11,161.48	-231.40	37.83	233.89	0.00	0.00	0.00	0.00
11/25/2010	NORMAL	11,620.00	1.13	115.99	11,616.39	-235.34	45.90	239.58	0.00	0.00	0.00	0.00

74  
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570

<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>			
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579			
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> UTE			
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES			
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B			
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000			
<b>11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA</b>		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES			
<b>TYPE OF SUBMISSION</b>  <input checked="" type="checkbox"/> <b>NOTICE OF INTENT</b> Approximate date work will start: 3/18/2014  <input type="checkbox"/> <b>SUBSEQUENT REPORT</b> Date of Work Completion:  <input type="checkbox"/> <b>SPUD REPORT</b> Date of Spud:  <input type="checkbox"/> <b>DRILLING REPORT</b> Report Date:	<b>TYPE OF ACTION</b>  <table style="width: 100%; border: none;"> <tr> <td style="width: 33%; vertical-align: top;"> <input type="checkbox"/> ACIDIZE  <input type="checkbox"/> CHANGE TO PREVIOUS PLANS  <input type="checkbox"/> CHANGE WELL STATUS  <input type="checkbox"/> DEEPEN  <input type="checkbox"/> OPERATOR CHANGE  <input type="checkbox"/> PRODUCTION START OR RESUME  <input type="checkbox"/> REPERFORATE CURRENT FORMATION  <input type="checkbox"/> TUBING REPAIR  <input type="checkbox"/> WATER SHUTOFF  <input type="checkbox"/> WILDCAT WELL DETERMINATION         </td> <td style="width: 33%; vertical-align: top;"> <input type="checkbox"/> ALTER CASING  <input type="checkbox"/> CHANGE TUBING  <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS  <input type="checkbox"/> FRACTURE TREAT  <input type="checkbox"/> PLUG AND ABANDON  <input type="checkbox"/> RECLAMATION OF WELL SITE  <input type="checkbox"/> SIDETRACK TO REPAIR WELL  <input type="checkbox"/> VENT OR FLARE  <input type="checkbox"/> SI TA STATUS EXTENSION  <input type="checkbox"/> OTHER         </td> <td style="width: 33%; vertical-align: top;"> <input type="checkbox"/> CASING REPAIR  <input type="checkbox"/> CHANGE WELL NAME  <input type="checkbox"/> CONVERT WELL TYPE  <input type="checkbox"/> NEW CONSTRUCTION  <input type="checkbox"/> PLUG BACK  <input checked="" type="checkbox"/> RECOMPLETE DIFFERENT FORMATION  <input type="checkbox"/> TEMPORARY ABANDON  <input type="checkbox"/> WATER DISPOSAL  <input type="checkbox"/> APD EXTENSION          OTHER: <input style="width: 100px;" type="text"/> </td> </tr> </table>		<input type="checkbox"/> ACIDIZE <input type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> DEEPEN <input type="checkbox"/> OPERATOR CHANGE <input type="checkbox"/> PRODUCTION START OR RESUME <input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> WATER SHUTOFF <input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> ALTER CASING <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> SI TA STATUS EXTENSION <input type="checkbox"/> OTHER	<input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CONVERT WELL TYPE <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> PLUG BACK <input checked="" type="checkbox"/> RECOMPLETE DIFFERENT FORMATION <input type="checkbox"/> TEMPORARY ABANDON <input type="checkbox"/> WATER DISPOSAL <input type="checkbox"/> APD EXTENSION OTHER: <input style="width: 100px;" type="text"/>
<input type="checkbox"/> ACIDIZE <input type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> DEEPEN <input type="checkbox"/> OPERATOR CHANGE <input type="checkbox"/> PRODUCTION START OR RESUME <input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> WATER SHUTOFF <input type="checkbox"/> WILDCAT WELL DETERMINATION	<input type="checkbox"/> ALTER CASING <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> SI TA STATUS EXTENSION <input type="checkbox"/> OTHER	<input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CONVERT WELL TYPE <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> PLUG BACK <input checked="" type="checkbox"/> RECOMPLETE DIFFERENT FORMATION <input type="checkbox"/> TEMPORARY ABANDON <input type="checkbox"/> WATER DISPOSAL <input type="checkbox"/> APD EXTENSION OTHER: <input style="width: 100px;" type="text"/>			
<b>12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.</b>  The operator requests authorization to conduct recompletion operations on the referenced well. Please see the attached recompletion procedure. This is a State courtesy copy for the referenced Federal Well. <div style="text-align: center;">Thank you.</div> <div style="text-align: right; margin-top: 20px;"> <b>Accepted by the Utah Division of Oil, Gas and Mining</b>   <b>Date:</b> March 19, 2014  <b>By:</b> </div>					
<b>NAME (PLEASE PRINT)</b> Matthew P Wold		<b>PHONE NUMBER</b> 720 929-6993			
<b>SIGNATURE</b> N/A		<b>TITLE</b> Regulatory Analyst I			
<b>DATE</b> 3/18/2014					





# **Greater Natural Buttes Unit**

**NBU 920-13B  
RE-COMPLETIONS PROCEDURE  
NBU 920-13B PAD  
FIELD ID: N/A**

**DATE: 3/11/2014  
AFE#:  
API#: 4304750152  
USER ID: SNT239 (Frac Invoices Only)**

**COMPLETIONS ENGINEER: Jamie Berghorn, Denver, CO  
(720) 929-6230 (Office)  
(303) 909-3417 (Cell)**

**REMEMBER SAFETY FIRST!**

**Name:** **NBU 920-13B**  
**Location:** **NW NE Sec 13 T9S R20E**  
**LAT:** 40.040330 **LONG:** -109.610710 **COORDINATE:** NAD83 (*Surface Location*)  
**Uintah County, UT**

**ELEVATIONS:** 4768' GL 4794' KB *Frac Registry TVD: 11616'*

**TOTAL DEPTH:** 11620' **PBTD:** 11573'  
**SURFACE CASING:** 8 5/8", 28# J-55 LTC @ 2872'  
**PRODUCTION CASING:** 4 1/2", 11.6#, P-110 LTC @ 10699'  
 4 1/2", 11.6#, P-110 BTC @ 11618'  
 Marker Joint **5130'-5152', 10479'-10494'**

**TUBULAR PROPERTIES:**

	BURST (psi)	COLLAPSE (psi)	DRIFT DIA. (in.)	CAPACITIES	
				(bbl./ft)	(gal/ft)
2 3/8" 4.7# L-80 tbg	11,200	11,780	1.901"	0.00387	0.1624
4 1/2" 11.6# I-80 (See above)	7780	6350	3.875"	0.0155	0.6528
4 1/2" 11.6# P-110	10691	7580	3.875"	0.0155	0.6528
2 3/8" by 4 1/2" Annulus				0.0101	0.4227

**TOPS:**

1764' Green River Top  
 2016' Bird's Nest Top  
 2541' Mahogany Top  
 5207' Wasatch Top  
 8381' Mesaverde Top  
 \*Based on latest geological interpretation

**BOTTOMS:**

8381' Wasatch Bottom  
 11620' Mesaverde Bottom (TD)

**T.O.C. @ 2774'**

\*\*Based on latest interpretation of CBL

**GENERAL NOTES:**

- **Please note that:**
  - All stages on this procedure may or may not be completed due to low frac gradients, timing, or other possible reasons. Total stages completed can be found in the post-job-report.
  - CBP depth on this procedure is only to be used as a reference. This depth is subject to change as per field operations and the discretion of the wireline supervisor and field foreman.
- A minimum of **39** tanks (cleaned lined 500 bbl) of recycled water will be required. Note: Use biocide in tanks and the water needs to be at least 45°F at pump time.
- All perforation depths are from Cutter's GRlog dated **1/6/2011**.
- **13** fracturing stages required for coverage.
- Hydraulic isolation estimated at **3380** based upon Cutter's CBL dated 1/6/2011.
- Procedure calls for **14** CBP's (**8000** psi) .
- Calculate open perforations after each breakdown. If less than 60% of the perforations appear to be open, ball out with 15% HCl.
- **Pump scale inhibitor at 0.5 gpt. Remember to pre-load the casing with scale inhibitor.**

- FR will be pumped at 0.3 gpt for this well. This concentration will be raised or lowered on the job at the discretion of the APC foreman per the well's treating pressure.
- 30/50 mesh Ottawa sand, **Slickwater frac.**
- Maximum surface pressure **6200 psi.**
- **If casing pressure test fails (pressure loss of 1.5% psi or more), retest for 15 minutes. If pressure loss of 1.5% more on second test, notify Denver engineers. Record in Openwells. MIRU with tubing and packer. Isolate leak by pressure testing above and below the packer. RIH and set appropriate casing leak remediation. Re-pressure test to 1000 and 3500 psi for 15 minutes each and to 6200 psi for 30 minutes (specific details on remediation should be documented in OpenWells).**
- Flush volumes are the sum of slick water and acid used during displacement (include scale inhibitor as mentioned above). Stage acid and scale inhibitor if necessary to cover the next perforated interval.
- Call flush at 0 PPG @ inline densimeters. Slow to 5 bbl/min over last 10-20 bbls of flush. Flush to top perf.
- Max Sand Concentration: Mesaverde 1 ppg; Wasatch 2 ppg;
- If distance between plug and top perf of previous stage is less than 50', it is considered to be tight spacing – design will over flush stage by 5 bbls (from top perf)
- **TIGHT SPACING ON STAGE 1, 3, 5, 6, 8, 10**
- **If using any chemicals for pickling tubing or H2S Scavenging, have MSDS for all chemicals prior to starting work**

#### Existing Perforations:

<u>PERFORATIONS</u>							
<u>Formation</u>	<u>Zone</u>	<u>Top</u>	<u>Btm</u>	<u>spf</u>	<u>Shots</u>	<u>Date</u>	<u>Reason</u>
MESAVERDE		11151	11154	4	12	01/10/2011	PRODUCTION
MESAVERDE		11159	11162	4	12	01/10/2011	PRODUCTION
MESAVERDE		11165	11167	4	8	01/10/2011	PRODUCTION
MESAVERDE		11218	11220	3	6	01/09/2011	PRODUCTION
MESAVERDE		11240	11242	3	6	01/09/2011	PRODUCTION
MESAVERDE		11255	11257	3	6	01/09/2011	PRODUCTION
MESAVERDE		11306	11308	3	6	01/09/2011	PRODUCTION
MESAVERDE		11318	11320	4	8	01/09/2011	PRODUCTION
MESAVERDE		11423	11425	4	8	01/06/2011	PRODUCTION
MESAVERDE		11439	11442	4	12	01/06/2011	PRODUCTION
MESAVERDE		11449	11452	4	12	01/06/2011	PRODUCTION

#### Relevant History:

- 12/21/2010: Originally completed in Lower Mesaverde formation (3 stages) with ~ 545,271 gallons of Slickwater, 302428 lbs of 30/50 TLC sand
- 01/13/2011: Tubing Currently Landed @~10530'

**H2S History:**

Insert recent/available H<sub>2</sub>S data from Amulet

**PROCEDURE: (If using any chemicals for pickling tubing or H<sub>2</sub>S Scavenging, have MSDS for all chemicals prior to starting work.)**

1. MIRU. Control well with recycled water and biocide as required. ND WH, NU BOP's and test.
2. The tubing is below the proposed CBP depth. TOO H with 2-3/8", 4.7#, L-80 tubing. Visually inspect for scale and consider replacing if needed.
3. If tbg looks ok consider running a gauge ring to 10519' (50' below proposed CBP). Otherwise P/U a mill and C/O to 10519' (50' below proposed CBP).
4. Set 8000 psi CBP at ~ 10469'. ND BOPs and NU frac valves Test frac valves and casing to to **6200 psi** for 15 minutes; if pressure test fails contact Denver engineer and see notes above. **Lock OPEN the Braden head valve.** Flow from annulus will be visually monitored throughout stimulation. If release occurs, stimulation will be shut down. Well conditions will be assessed and actions taken as necessary to secure the well. UDOGM will be notified if a release to the annulus occurs.
5. Pressure test frac lines to max surface pressure + 1000 psi for 15 minutes. Pressure loss should be less than 10% to be considered acceptable. Check and correct for existing leaks.
6. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:
 

Zone	From	To	spf	# of shots
MESAVERDE	10239	10240	3	3
MESAVERDE	10260	10261	3	3
MESAVERDE	10282	10283	3	3
MESAVERDE	10334	10335	3	3
MESAVERDE	10345	10346	3	3
MESAVERDE	10369	10370	3	3
MESAVERDE	10411	10412	3	3
MESAVERDE	10438	10439	3	3
7. Breakdown perfs and establish injection rate (include scale inhibitor in fluid). Spot 250 gals of 15% HCL and let soak 5-10 min. Fracture as outlined in Stage 1 on attached listing. Under-displace to ~10239' and trickle 250gal 15%HCL w/ scale inhibitor in flush .

8. Set 8000 psi CBP at ~10229'. Perf the following 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
MESAVERDE	10014	10015	3	3
MESAVERDE	10042	10043	3	3
MESAVERDE	10081	10082	3	3
MESAVERDE	10161	10162	3	3
MESAVERDE	10178	10179	3	3
MESAVERDE	10193	10194	3	3
MESAVERDE	10214	10216	3	6

9. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 2 on attached listing. Under-displace to ~10014' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

10. Set 8000 psi CBP at ~9953'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
MESAVERDE	9752	9753	3	3
MESAVERDE	9778	9779	3	3
MESAVERDE	9838	9839	3	3
MESAVERDE	9847	9848	3	3
MESAVERDE	9879	9880	3	3
MESAVERDE	9903	9904	3	3
MESAVERDE	9938	9940	3	6

11. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 3 on attached listing. Under-displace to ~9752' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

12. Set 8000 psi CBP at ~9739'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
MESAVERDE	9546	9547	3	3
MESAVERDE	9565	9566	3	3
MESAVERDE	9606	9607	3	3
MESAVERDE	9622	9623	3	3
MESAVERDE	9694	9695	3	3
MESAVERDE	9712	9713	3	3
MESAVERDE	9717	9719	3	6

13. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 4 on attached listing. Under-displace to ~9546' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

14. Set 8000 psi CBP at ~9269'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
MESAVERDE	8979	8980	3	3
MESAVERDE	9007	9008	3	3
MESAVERDE	9023	9024	3	3
MESAVERDE	9043	9044	3	3
MESAVERDE	9206	9207	3	3
MESAVERDE	9222	9223	3	3
MESAVERDE	9237	9239	3	6

15. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 5 on attached listing. Under-displace to ~8979' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

16. Set 8000 psi CBP at ~8966'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
MESAVERDE	8728	8729	3	3
MESAVERDE	8745	8746	3	3
MESAVERDE	8771	8772	3	3
MESAVERDE	8787	8788	3	3
MESAVERDE	8815	8816	3	3
MESAVERDE	8877	8878	3	3

MESAVERDE	8896	8897	3	3
MESAVERDE	8935	8936	3	3

17. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 6 on attached listing. Under-displace to ~8728' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

18. Set 8000 psi CBP at ~8717'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
MESAVERDE	8514	8515	3	3
MESAVERDE	8554	8555	3	3
MESAVERDE	8616	8617	3	3
MESAVERDE	8641	8642	3	3
MESAVERDE	8672	8674	3	6
MESAVERDE	8695	8697	3	6

19. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 7 on attached listing. Under-displace to ~8514' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

20. Set 8000 psi CBP at ~8464'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
WASATCH	8231	8232	3	3
WASATCH	8255	8256	3	3
WASATCH	8307	8308	3	3
WASATCH	8316	8317	3	3
WASATCH	8330	8331	3	3
MESAVERDE	8396	8397	3	3
MESAVERDE	8426	8427	3	3
MESAVERDE	8443	8444	3	3

21. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 8 on attached listing. Under-displace to ~8231' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

22. Set 8000 psi CBP at ~8221'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
WASATCH	8003	8004	3	3
WASATCH	8075	8076	3	3
WASATCH	8094	8095	3	3
WASATCH	8121	8122	3	3
WASATCH	8168	8169	3	3
WASATCH	8173	8174	3	3
WASATCH	8189	8191	3	6

23. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 9 on attached listing. Under-displace to ~8003' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

24. Set 8000 psi CBP at ~7766'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
WASATCH	7435	7436	3	3
WASATCH	7441	7442	3	3
WASATCH	7471	7472	3	3
WASATCH	7537	7538	3	3



WASATCH	7552	7553	3	3
WASATCH	7636	7637	3	3
WASATCH	7734	7736	3	6

25. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 10 on attached listing. Under-displace to ~7435' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

26. Set 8000 psi CBP at ~7425'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
WASATCH	7173	7174	3	3
WASATCH	7241	7242	3	3
WASATCH	7303	7304	3	3
WASATCH	7325	7326	3	3
WASATCH	7337	7338	3	3
WASATCH	7377	7378	3	3
WASATCH	7397	7398	3	3
WASATCH	7411	7412	3	3

27. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 11 on attached listing. Under-displace to ~7173' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

28. Set 8000 psi CBP at ~6610'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
WASATCH	6546	6550	3	12
WASATCH	6576	6580	3	12

29. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 12 on attached listing. Under-displace to ~6546' and trickle 250gal 15%HCL w/ scale inhibitor in flush.

30. Set 8000 psi CBP at ~6231'. Perf the following with 3-1/8" gun, 19 gm, 0.40" hole:

Zone	From	To	spf	# of shots
WASATCH	6162	6164	3	6
WASATCH	6176	6178	3	6
WASATCH	6194	6196	3	6
WASATCH	6199	6201	3	6

31. Breakdown perfs and establish injection rate. Fracture as outlined in Stage 13 on attached listing. Under-displace to ~6162' and flush only with recycled water.

32. Set 8000 psi CBP at ~6112'.

33. ND Frac Valves, NU and Test BOPs.

34. TIH with 3 7/8" bit, pump off bit sub, SN and tubing.

35. Drill plugs and clean out to PBTD. Shear off bit and land tubing at **±9984'** unless indicated otherwise by the well's behavior.

36. Clean out well with foam and/or swabbing unit until steady flow has been established from completion.

37. **Leave surface casing valve open.** Monitor and report any flow from surface casing. RDMO

Completion Engineer

Jamie Berghorn: 303/909-3417, 720/929-6230

Production Engineer

Mickey Doherty: 406/491-7294, 435/781-9740

Ronald Trigo: 352/213-6630, 435/781-7037

Brad Laney: 435/781-7031, 435/828-5469

Heath Pottmeyer: 740/525-3445, 435/781-9789

Anqi Yang: 435/828-6505, 435/781-7015

Completion Supervisor Foreman

Jeff Samuels: 435/828-6515, 435/781-7046

Completion Manager

Jeff Dufresne: 720/929-6281, 303/241-8428

Vernal Main Office

435/789-3342

Emergency Contact Information—Call 911

Vernal Regional Hospital Emergency: 435-789-3342

Police: (435) 789-5835

Fire: 435-789-4222

Acid Pickling and H2S Procedures (If Required)

**\*\*PROCEDURE FOR PUMPING ACID DOWN TBG**

WHEN FINDING SCALE IN TUBING THAT IS ACID SOLUBLE, ENSURE THAT PLUNGER EQUIPMENT IS REMOVED AND ABLE TO PUMP DOWN TBG. INSTALL A 'T' IN PUMP LINE W/2" VALVE THAT NALCO CAN TIE INTO. HAVE 60 BBLs 2% KCL MIXED W/ 10-15 GAL H2S SCAVENGER IN RIG FLAT TANK. (WE USED THE RIG FLAT TANK FOR MIXING CHEMICAL SO WE DIDN'T HAVE THE CHEMICAL IN ALL FLUIDS ON LOCATION, ONLY WHAT WE NEEDED TO PUMP DOWN HOLE)

1. PUMP 5-10 BBLs 2% KCL DOWN TBG (NALCO CANNOT PUMP AGAINST PRESSURE)
2. NALCO WILL PUMP 3 DRUMS HCL (31%) INTO PUMP LINE.
3. FLUSH BEHIND ACID WITH 10-15 BBL 2% KCL
4. PUMP 2—30 BBL 2% W/ H2S SCAVENGER DOWN TBG.
5. PUMP REMAINDER OF 2% W/ H2S SCAVENGER DOWN CASING AND SHUT WELL IN FOR MINIMUM OF 2 HRS.
6. OVER DISPLACE DOWN TBG AND CSG TO FLUSH ACID AND SCAVENGER INTO FORMATION
7. MONITOR TUBING FOR FLOW AND CASING FOR H2S NOW AS POOH W/ TUBING.

**\*\* PROCEDURE FOR PUMPING H2S SCAVENGER WITHOUT ACID**

PRIOR TO RIG MOVING ON OR AS RIG PULLS ONTO LOCATION. TEST CASING, TUBING AND SEPARATOR FOR H<sub>2</sub>S. IF FOUND MAKE SURE THAT PLUNGER SYSTEM IS REMOVED (IT IS POSSIBLE TO PUMP AROUND PLUNGERS BUT SOME WILL HAVE A STANDING VALVE IN SEATING NIPPLE).

1. MIX 10-15 GAL H<sub>2</sub>S SCAVENGER WITH 60-100 BBL 2% KCL IN RIG FLAT TANK.
2. PUMP 25 BBL MIXTURE DOWN TUBING AND REST DOWN CASING. SHUT WELL IN FOR 2 HOURS.
3. IF WELL HAS PRESSURE AFTER 2 HOURS – RETEST CASING AND TUBING FOR H<sub>2</sub>S.
4. FLUSH TUBING AND CASING PUSHING H<sub>2</sub>S SCAVENGER INTO FORMATION.
5. MONITOR TUBING FOR FLOW AND CASING FOR H<sub>2</sub>S NOW AS POOH W/ TUBING.

\*\* As per APC standard operating procedure, APC foreman will verify ALL volumes pumped and record on APC Volume Report Form

Service Company Supplied Chemicals - Job Totals

Friction Reducer	216	gals @	0.3	GPT
Surfactant	721	gals @	1.0	GPT
Clay Stabilizer	0	gals @	0.0	GPT
15% Hcl	3250	gals @	250	gal/stg
Iron Control for acid	16	gals @	5.0	GPT of acid
Surfactant for acid	7	gals @	2.0	GPT of acid
Corrosion Inhibitor for acid	20	gals @	6.0	GPT of acid

Third Party Supplied Chemicals Job Totals - Include Pumping Charge if Applicable

Scale Inhibitor	360	gals pumped	0.5	GPT (see schedule)
Biocide	216	gals @	0.3	GPT

**Fracturing Schedules**  
**NBU 920-13B**  
**Slickwater Frac**

Copy to new book

Casing Size	4.5
Recompleter?	Y
Pad?	Y
ACTS?	N
Days on Pad?	1
Wells on Pad?	1

Swabbing Days	3
Production Log	0
DFIT	0
GR only	Y
Low Scale	Y
Clay Stab.	N

Enter Number of swabbing days here for recompletes  
 Enter 1 if running a Production Log  
 Enter Number of DFITs  
 Enter Y if only Gamma Ray log was run  
 Enter Y if a LOW concentration of Scale Inhibitor will be pumped  
 Enter N if there will be NO Clay stabilizer

Stage	Zone	Perfs Top ft. Bot. ft	SPF	Holes	Rate BPM	Fluid Type	Initial ppg	Final ppg	Fluid	Volume gals	Cum Vol gals	Volume BBLs	Cum Vol BBLs	Fluid % of frac	Sand % of frac	Sand lbs	Cum. Sand lbs	Footage from CBP to Flush	Scale Inhib., gal.
1	MESAVERDE	10239	10240	3	3	Varied	Pre-Pad & Pump-in test		Slickwater	6,684	6,684	159	159						3
	MESAVERDE	10260	10261	3	3	0 ISIP and 5 min ISIP			Slickwater	5,940	12,624	141	301	15.0%	0.0%	0	0		3
	MESAVERDE	10282	10283	3	3	50 Slickwater Pad		0.25	Slickwater	11,220	23,844	267	568	28.3%	21.9%	4,909	4,909	0	6
	MESAVERDE	10334	10335	3	3	50 Slickwater Ramp		0	Slickwater	0	23,844	0	568	0.0%	0.0%	0	4,909	0	6
	MESAVERDE	10345	10346	3	3	50 SW Sweep		0.63	Slickwater	11,220	35,064	267	835	28.3%	34.4%	7,714	12,623	0	6
	MESAVERDE	10369	10370	3	3	50 Slickwater Ramp		0	Slickwater	0	35,064	0	835	0.0%	0.0%	0	12,623	0	0
	MESAVERDE	10411	10412	3	3	50 SW Sweep		0.25	Slickwater	0	35,064	0	835	0.0%	0.0%	0	12,623	0	0
	MESAVERDE	10438	10439	3	3	50 Slickwater Ramp		0.75	Slickwater	11,220	46,284	267	1,102	28.3%	43.8%	9,818	22,440	0	6
	MESAVERDE					50 Flush (4-1/2)			Slickwater	6,684	52,968	159	1,261				22,440	0	3
	MESAVERDE					ISDP and 5 min ISDP					52,968								26
	MESAVERDE								Sand laden Volume		39,600						340 lbs sand/ft		
					24										gal/ft	600	10,229	10	
2	MESAVERDE	10014	10015	3	3	25.2	<< Above pump time (min)		Slickwater	5,760	5,760	137	137	15.0%	0.0%	0	0		3
	MESAVERDE	10042	10043	3	3	0 ISIP and 5 min ISIP			Slickwater	10,880	16,640	259	396	28.3%	21.9%	4,760	4,760	0	5
	MESAVERDE	10081	10082	3	3	50 Slickwater Pad		0.25	Slickwater	0	16,640	0	396	0.0%	0.0%	0	4,760	0	0
	MESAVERDE	10161	10162	3	3	50 SW Sweep		0.63	Slickwater	0	27,520	259	655	28.3%	34.4%	7,480	12,240	0	5
	MESAVERDE	10178	10179	3	3	50 Slickwater Ramp		0	Slickwater	10,880	27,520	259	655	0.0%	0.0%	0	12,240	0	0
	MESAVERDE	10193	10194	3	3	50 SW Sweep		0	Slickwater	0	27,520	0	655	0.0%	0.0%	0	12,240	0	0
	MESAVERDE	10214	10216	3	6	50 Slickwater Ramp		0.25	Slickwater	0	27,520	0	655	0.0%	0.0%	0	12,240	0	0
	MESAVERDE					50 Slickwater Ramp		0.75	Slickwater	10,880	38,400	259	914	28.3%	43.8%	9,520	21,760	0	5
	MESAVERDE					50 Flush (4-1/2)			Slickwater	6,537	44,937	156	1,070				21,760	0	3
	MESAVERDE					ISDP and 5 min ISDP					44,937								22
	MESAVERDE								Sand laden Volume		38,400						340 lbs sand/ft		
					24										gal/ft	600	9,953	61	
3	MESAVERDE	9752	9753	3	3	21.4	<< Above pump time (min)		Slickwater	0	0	0	0						
	MESAVERDE	9778	9779	3	3	Varied	Pump-in test		Slickwater	10,890	10,890	259	259	15.0%	0.0%	0	0		5
	MESAVERDE	9838	9839	3	3	0 ISIP and 5 min ISIP		0.25	Slickwater	20,570	31,460	490	749	28.3%	21.9%	8,999	8,999	0	10
	MESAVERDE	9847	9848	3	3	50 Slickwater Pad		0	Slickwater	0	31,460	0	749	0.0%	0.0%	0	8,999	0	0
	MESAVERDE	9879	9880	3	3	50 SW Sweep		0.63	Slickwater	20,570	52,030	490	1,239	28.3%	34.4%	14,142	23,141	0	10
	MESAVERDE	9903	9904	3	3	50 Slickwater Ramp		0	Slickwater	0	52,030	0	1,239	0.0%	0.0%	0	23,141	0	0
	MESAVERDE	9938	9940	3	6	50 SW Sweep		0.25	Slickwater	0	52,030	0	1,239	0.0%	0.0%	0	23,141	0	0
	MESAVERDE					50 Slickwater Ramp		0.75	Slickwater	20,570	72,600	490	1,729	28.3%	43.8%	17,999	41,140	0	10
	MESAVERDE					50 Flush (4-1/2)			Slickwater	6,366	78,966	152	1,880				41,140	0	3
	MESAVERDE					ISDP and 5 min ISDP					78,966								39
	MESAVERDE								Sand laden Volume		72,600						340 lbs sand/ft		
					24										gal/ft	600	9,739	13	

11

12



Sage	Zone	Perfs		SPF	Holes	Rate BPM	Fluid Type	Initial ppg	Final ppg	Fluid	Volume gals	Cum Vol gals	Volume BBLs	Cum Vol BBLs	Fluid % of frac	Sand % of frac	Sand lbs	Cum. Sand lbs	Footage from CBP to Flush	Scale Inhib., gal.
		Top, ft.	Bot., ft.																	
10	WASATCH	7435	7436	3	3	Varied	Pump-in test			Slickwater		0	0	0	0					
	WASATCH	7441	7442	3	3	0	ISIP and 5 min ISIP			Slickwater	9,120	9,120	217	217	15.0%	0.0%	0	0		5
	WASATCH	7471	7472	3	3	50	Slickwater Pad			Slickwater	30,400	39,520	724	941	50.0%	37.3%	19,000	19,000	15	
	WASATCH	7537	7538	3	3	50	Slickwater Ramp	0.25	1	Slickwater	21,280	60,800	507	1,448	35.0%	62.7%	31,920	50,920	11	
	WASATCH	7552	7553	3	3	50	Slickwater Ramp		2	Slickwater	4,854	65,654	116	1,563			50,920	50,920	2	
	WASATCH	7636	7637	3	3	50	Flush (4-1/2)			Slickwater									0	
	WASATCH	7734	7736	3	6	ISDP and 5 min ISDP			Slickwater									0		
	WASATCH																	0		
	WASATCH																	0		
	WASATCH																	0		
11	WASATCH	7173	7174	3	3	31.3	Pump-in test			Slickwater		0	0	0						
	WASATCH	7241	7242	3	3	Varied	Pump-in test			Slickwater	7,380	7,380	176	176	15.0%	0.0%	0	0		4
	WASATCH	7303	7304	3	3	50	Slickwater Pad			Slickwater	24,600	31,980	586	761	50.0%	37.3%	15,375	15,375	12	
	WASATCH	7325	7326	3	3	50	Slickwater Ramp	0.25	1	Slickwater	17,220	49,200	410	1,171	35.0%	62.7%	25,830	41,205	9	
	WASATCH	7337	7338	3	3	50	Slickwater Ramp		2	Slickwater	4,683	53,883	111	1,283			41,205	41,205	2	
	WASATCH	7377	7378	3	3	50	Flush (4-1/2)			Slickwater									0	
	WASATCH	7397	7398	3	3	ISDP and 5 min ISDP			Slickwater									0		
	WASATCH	7411	7412	3	3													0		
	WASATCH																	0		
	WASATCH																	0		
12	WASATCH	6546	6550	3	12	25.7	Pump-in test			Slickwater		0	0	0						
	WASATCH	6576	6580	3	12	Varied	Pump-in test			Slickwater	4,020	4,020	96	96	15.0%	0.0%	0	0		2
	WASATCH					50	Slickwater Pad	0.25	1	Slickwater	13,400	17,420	319	415	50.0%	37.3%	8,375	8,375	7	
	WASATCH					50	Slickwater Ramp		2	Slickwater	9,380	26,800	223	638	35.0%	62.7%	14,070	22,445	5	
	WASATCH					50	Slickwater Ramp			Slickwater	4,273	31,073	102	740			22,445	22,445	2	
	WASATCH					50	Flush (4-1/2)			Slickwater									0	
	WASATCH					ISDP and 5 min ISDP			Slickwater									0		
	WASATCH																	0		
	WASATCH																	0		
	WASATCH																	0		
13	WASATCH				24	14.8				Sand laden Volume		26,800								
	WASATCH																			
	WASATCH																			
	WASATCH																			
	WASATCH																			
	WASATCH																			
	WASATCH																			
	WASATCH																			
	WASATCH																			
	WASATCH																			

Stage	Zone	Perfs		Rate BPM	Fluid Type	Initial ppg	Final ppg	Fluid	Volume gals	Cum Vol gals	Volume BBLs	Cum Vol BBLs	Fluid % of frac	Sand % of frac	Sand lbs	Cum. Sand lbs	Footage from CBP to Flush	Scale Inhib., gal.
		Top, ft.	Bot., ft															
	13	WASATCH	6162	6164	3	6			Slickwater	0	0	0	0					
		WASATCH	6176	6178	3	6	Pump-in test											
		WASATCH	6194	6196	3	6	0 ISIP and 5 min ISIP											
		WASATCH	6199	6201	3	6	50 Slickwater Pad		Slickwater	3,147	75	75	15.0%	0.0%	0	0		2
		WASATCH					50 Slickwater Ramp	0.25	Slickwater	10,489	250	325	50.0%	37.3%	6,555	6,555		5
		WASATCH					50 Slickwater Ramp	1	Slickwater	7,342	20,977	175	499	35.0%	62.7%	11,013	17,569	4
		WASATCH					Flush (4-1/2)	2	Slickwater	25,000	96	595			17,569	17,569	0	
		WASATCH					ISDP and 5 min ISDP		Slickwater									0
		WASATCH								25,000	96	595			17,569	17,569	0	0
		WASATCH																0
										20,977					807	676	lbs sandlft	10
														gal/lft	CBP depth	6,112	50	
			# of Perfs/stage	24		11.9						Flush depth	6,162					
	Totals					312			Total Fluid	724,627 gals 17,253 bblis					Total Sand	427,090		
							5.8					38.3 tanks				Total Scale Inhib. =		360
Total Stages 13 stages																		
Last Stage Flush 4,023 galls																		

## NBU 920-13B

## Perforation and CBP Summary

Stage	Zones	Perforations		SPF	Holes	Fracture Coverage		
		Top, ft	Bottom, ft					
1	MESAVERDE	10239	10240	3	3	10236	to	10441.5
	MESAVERDE	10260	10261	3	3			
	MESAVERDE	10282	10283	3	3			
	MESAVERDE	10334	10335	3	3			
	MESAVERDE	10345	10346	3	3			
	MESAVERDE	10369	10370	3	3			
	MESAVERDE	10411	10412	3	3			
	MESAVERDE	10438	10439	3	3			
	# of Perfs/stage				24	CBP DEPTH	10,229	
2	MESAVERDE	10014	10015	3	3	10009	to	10216
	MESAVERDE	10042	10043	3	3			
	MESAVERDE	10081	10082	3	3			
	MESAVERDE	10161	10162	3	3			
	MESAVERDE	10178	10179	3	3			
	MESAVERDE	10193	10194	3	3			
	MESAVERDE	10214	10216	3	6			
	MESAVERDE							
	# of Perfs/stage				24	CBP DEPTH	9,953	
3	MESAVERDE	9752	9753	3	3	9742	to	9944
	MESAVERDE	9778	9779	3	3			
	MESAVERDE	9838	9839	3	3			
	MESAVERDE	9847	9848	3	3			
	MESAVERDE	9879	9880	3	3			
	MESAVERDE	9903	9904	3	3			
	MESAVERDE	9938	9940	3	6			
	MESAVERDE							
	# of Perfs/stage				24	CBP DEPTH	9,739	
4	MESAVERDE	9546	9547	3	3	9540	to	9723
	MESAVERDE	9565	9566	3	3			
	MESAVERDE	9606	9607	3	3			
	MESAVERDE	9622	9623	3	3			
	MESAVERDE	9694	9695	3	3			
	MESAVERDE	9712	9713	3	3			
	MESAVERDE	9717	9719	3	6			
	MESAVERDE							
	# of Perfs/stage				24	CBP DEPTH	9,269	
5	MESAVERDE	8979	8980	3	3	8979	to	9246
	MESAVERDE	9007	9008	3	3			
	MESAVERDE	9023	9024	3	3			
	MESAVERDE	9043	9044	3	3			
	MESAVERDE	9206	9207	3	3			
	MESAVERDE	9222	9223	3	3			
	MESAVERDE	9237	9239	3	6			
	MESAVERDE							
	# of Perfs/stage				24	CBP DEPTH	8,966	
6	MESAVERDE	8728	8729	3	3	8728	to	8943
	MESAVERDE	8745	8746	3	3			
	MESAVERDE	8771	8772	3	3			
	MESAVERDE	8787	8788	3	3			
	MESAVERDE	8815	8816	3	3			
	MESAVERDE	8877	8878	3	3			
	MESAVERDE	8896	8897	3	3			
	MESAVERDE	8935	8936	3	3			
	# of Perfs/stage				24	CBP DEPTH	8,717	

Stage	Zones	Perforations		SPF	Holes	Fracture Coverage		
		Top, ft	Bottom, ft					
7	MESAVERDE	8514	8515	3	3	8513	to	8709
	MESAVERDE	8554	8555	3	3			
	MESAVERDE	8616	8617	3	3			
	MESAVERDE	8641	8642	3	3			
	MESAVERDE	8672	8674	3	6			
	MESAVERDE	8695	8697	3	6			
	MESAVERDE							
	MESAVERDE							
	# of Perfs/stage				24	CBP DEPTH	8,464	
8	WASATCH	8231	8232	3	3	8231	to	8452
	WASATCH	8255	8256	3	3			
	WASATCH	8307	8308	3	3			
	WASATCH	8316	8317	3	3			
	WASATCH	8330	8331	3	3			
	MESAVERDE	8396	8397	3	3			
	MESAVERDE	8426	8427	3	3			
	MESAVERDE	8443	8444	3	3			
	# of Perfs/stage				24	CBP DEPTH	8,221	
9	WASATCH	8003	8004	3	3	8003	to	8200
	WASATCH	8075	8076	3	3			
	WASATCH	8094	8095	3	3			
	WASATCH	8121	8122	3	3			
	WASATCH	8168	8169	3	3			
	WASATCH	8173	8174	3	3			
	WASATCH	8189	8191	3	6			
	WASATCH							
	# of Perfs/stage				24	CBP DEPTH	7,766	
10	WASATCH	7435	7436	3	3	7431	to	7747
	WASATCH	7441	7442	3	3			
	WASATCH	7471	7472	3	3			
	WASATCH	7537	7538	3	3			
	WASATCH	7552	7553	3	3			
	WASATCH	7636	7637	3	3			
	WASATCH	7734	7736	3	6			
	WASATCH							
	# of Perfs/stage				24	CBP DEPTH	7,425	
11	WASATCH	7173	7174	3	3	7172	to	7428
	WASATCH	7241	7242	3	3			
	WASATCH	7303	7304	3	3			
	WASATCH	7325	7326	3	3			
	WASATCH	7337	7338	3	3			
	WASATCH	7377	7378	3	3			
	WASATCH	7397	7398	3	3			
	WASATCH	7411	7412	3	3			
	# of Perfs/stage				24	CBP DEPTH	6,610	
12	WASATCH	6546	6550	3	12	6542	to	6601
	WASATCH	6576	6580	3	12			
	WASATCH							
	WASATCH							
	WASATCH							
	WASATCH							
	WASATCH							
	WASATCH							
	# of Perfs/stage				24	CBP DEPTH	6,231	
13	WASATCH	6162	6164	3	6	6162	to	6219
	WASATCH	6176	6178	3	6			
	WASATCH	6194	6196	3	6			
	WASATCH	6199	6201	3	6			
	WASATCH							
	WASATCH							
	WASATCH							
	WASATCH							
	# of Perfs/stage				24	CBP DEPTH	6,112	
Totals					312	Total Pay		957.0

<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> UTE
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000
<b>10. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES		<b>9. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES
<b>COUNTY:</b> UINTAH		<b>STATE:</b> UTAH
11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA		
<b>TYPE OF SUBMISSION</b>	<b>TYPE OF ACTION</b>	
<input type="checkbox"/> NOTICE OF INTENT Approximate date work will start:	<input type="checkbox"/> ACIDIZE	
<input type="checkbox"/> SUBSEQUENT REPORT Date of Work Completion:	<input type="checkbox"/> ALTER CASING	
<input type="checkbox"/> SPUD REPORT Date of Spud:	<input type="checkbox"/> CASING REPAIR	
<input checked="" type="checkbox"/> DRILLING REPORT Report Date: 5/31/2014	<input type="checkbox"/> CHANGE TO PREVIOUS PLANS	
	<input type="checkbox"/> CHANGE WELL STATUS	
	<input type="checkbox"/> CHANGE WELL NAME	
	<input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS	
	<input type="checkbox"/> CONVERT WELL TYPE	
	<input type="checkbox"/> DEEPEN	
	<input type="checkbox"/> FRACTURE TREAT	
	<input type="checkbox"/> NEW CONSTRUCTION	
	<input type="checkbox"/> OPERATOR CHANGE	
	<input type="checkbox"/> PLUG AND ABANDON	
	<input type="checkbox"/> PLUG BACK	
	<input checked="" type="checkbox"/> PRODUCTION START OR RESUME	
	<input type="checkbox"/> RECLAMATION OF WELL SITE	
	<input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION	
	<input type="checkbox"/> REPERFORATE CURRENT FORMATION	
	<input type="checkbox"/> SIDETRACK TO REPAIR WELL	
	<input type="checkbox"/> TEMPORARY ABANDON	
	<input type="checkbox"/> TUBING REPAIR	
	<input type="checkbox"/> VENT OR FLARE	
	<input type="checkbox"/> WATER DISPOSAL	
	<input type="checkbox"/> WATER SHUTOFF	
	<input type="checkbox"/> SI TA STATUS EXTENSION	
	<input type="checkbox"/> WILDCAT WELL DETERMINATION	
	<input type="checkbox"/> OTHER: <input style="width: 100px;" type="text"/>	
12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc. The NBU 920-13B was placed on production 05/31/2014 after a new well completion. Producing from the WASATCH/MESAVERDE		
Accepted by the Utah Division of Oil, Gas and Mining <b>FOR RECORD ONLY</b> June 02, 2014		
<b>NAME (PLEASE PRINT)</b> Kay E. Kelly	<b>PHONE NUMBER</b> 720 929 6582	<b>TITLE</b> Regulatory Analyst
<b>SIGNATURE</b> N/A	<b>DATE</b> 6/2/2014	

Form 3160-4  
(March 2012)UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENTFORM APPROVED  
OMB NO. 1004-0137  
Expires: October 31, 2014

## WELL COMPLETION OR RECOMPLETION REPORT AND LOG

1a. Type of Well ☐ Oil Well ☒ Gas Well ☐ Dry ☐ Other  
 b. Type of Completion: ☐ New Well ☐ Work Over ☐ Deepen ☐ Plug Back ☒ Diff. Resvr.,

Other: RECOMPLETION

2. Name of Operator  
KERR MCGEE OIL & GAS ONSHORE, L.P.3. Address PO BOX 173779  
DENVER, CO 802173a. Phone No. (include area code)  
720-929-6000

4. Location of Well (Report location clearly and in accordance with Federal requirements)\*

At surface NWNE 925 FNL 1555 FEL SEC 13,T9S,R20E

At top prod. interval reported below

At total depth

14. Date Spudded  
09/27/201015. Date T.D. Reached  
11/22/201016. Date Completed 05/31/2014  
☐ D & A ☒ Ready to Prod.5. Lease Serial No.  
UTU0579

6. If Indian, Allottee or Tribe Name

7. Unit or CA Agreement Name and No.  
UTU63047A8. Lease Name and Well No.  
NBU 920-13B9. API Well No.  
430475015210. Field and Pool or Exploratory  
NATURAL BUTTES11. Sec., T., R., M., on Block and  
Survey or Area SEC 13 T9S, R20E SLB

12. County or Parish

13. State

UINTAH

UT

17. Elevations (DF, RKB, RT, GL)\*  
4794 RKB18. Total Depth: MD 11620  
TVD 1161619. Plug Back T.D.: MD 10,387  
TVD 10,38320. Depth Bridge Plug Set: MD 10469,10459,10387  
TVD

21. Type Electric &amp; Other Mechanical Logs Run (Submit copy of each)

CBL/GR-BHV-SDL/DSN/ACTR

22. Was well cored? ☒ No ☐ Yes (Submit analysis)  
Was DST run? ☒ No ☐ Yes (Submit report)  
Directional Survey? ☒ No ☐ Yes (Submit copy)

23. Casing and Liner Record (Report all strings set in well)

Hole Size	Size/Grade	Wt. (#/ft.)	Top (MD)	Bottom (MD)	Stage Cement Depth	No. of Sks. & Type of Cement	Slurry Vol. (BBL)	Cement Top*	Amount Pulled
20	14 STL	36.7		40		28			
12.25	9.625 J-55	40.0		2872		606		0	
8.750	7 P-110	26		10698		1180		2774	
6.125	4.5 P-110	11.6		11618		90			

24. Tubing Record

Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)
2.375	9980							

25. Producing Intervals

Formation	Top	Bottom	Perforated Interval	Size	No. Holes	Perf. Status
A) WASATCH	6162	8331	6162-8331	0.40	135	OPEN
B) MESAVERDE	8396	10439	8396-10439	0.40	177	OPEN
C)						
D)						

27. Acid, Fracture, Treatment, Cement Squeeze, etc.

Depth Interval	Amount and Type of Material
6162-11452	PUMP 19,103 BBLs SLICK H2O, 71 BBLs 15% HCL ACID & 395,938 LBS 30/50 MESH SAND

28. Production - Interval A

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
5/31/14	6/10/14	24	→	32	2030	299			PUMPING
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas/Oil Ratio	Well Status	
38 /64	4510	1669	→	32	2030	299		PRODUCING	

28a. Production - Interval B

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
			→						
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas/Oil Ratio	Well Status	
			→						

\*(See instructions and spaces for additional data on page 2)



## 28b. Production - Interval C

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
			→						
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas/Oil Ratio	Well Status	
			→						

## 28c. Production - Interval D

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
			→						
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas/Oil Ratio	Well Status	
			→						

## 29. Disposition of Gas (Solid, used for fuel, vented, etc.)

SOLD

## 30. Summary of Porous Zones (Include Aquifers):

Show all important zones of porosity and contents thereof. Cored intervals and all drill-stem tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures and recoveries.

## 31. Formation (Log) Markers

Formation	Top	Bottom	Descriptions, Contents, etc.	Name	Top
					Meas. Depth
				GREEN RIVER	1764
				BIRD'S NEST	2016
				MAHOGANY	2541
				WASATCH	5207
				MESAVERDE	8381

## 32. Additional remarks (include plugging procedure):

Attached is the recompletion history and perforation report. Casing in the well is as previously reported on the original Completion Report. The well was originally completed in the Mesaverde from 11,151-11,452. The well was recompleted with iso plugs set at 10,469 ft and 10,459 ft.; new perforations in the Wasatch are from 6162-8331 and in the Mesaverde from 8,396-10,439. There are plugs still in the hole due to drill out equipment issues. These plugs will be drilled out at a future date. Production is currently from the new Wasatch and Mesaverde perforations above the PBTD of 10,387.

## 33. Indicate which items have been attached by placing a check in the appropriate boxes:

- ☐ Electrical/Mechanical Logs (1 full set req'd.)
 ☐ Geologic Report
 ☐ DST Report
 ☐ Directional Survey
- ☐ Sundry Notice for plugging and cement verification
 ☐ Core Analysis
 ☐ Other:

## 34. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records (see attached instructions)\*

Name (please print) ILA J. BEALETitle STAFF REGULATORY SPECIALISTSignature Date 6-18-2014

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B				Spud Conductor: 9/27/2010				Spud Date: 9/29/2010			
Project: UTAH-UINTAH				Site: NBU 920-13B				Rig Name No:			
Event: RECOMPL/RESEREVEADD				Start Date: 5/12/2014				End Date: 5/31/2014			
Active Datum: RKB @4,794.00usft (above Mean Sea Level)				UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0							
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation			
5/13/2014	7:00 - 7:30	0.50	FRAC	48	I	P		SCAN TBG			
	7:30 - 17:00	9.50	FRAC	45	A	P		RD, ROAD RIG FROM LOVE 1121-16L TO LOC, MIRU, BLOW DWN WELL, KILL WELL 20 BBLS TBG-CSG, NDWH, NU BOP'S, TEST BOP'S, UNLAND TBG, SCAN TBG OOH, STD BACK 98 STDS, LAY DWN 24 JTS TBG ON TLR. NOTE: CSG IS 7" 26#, 112 JTS IN HOLE, EOT 3528', SWIFN			
5/14/2014	7:00 - 7:30	0.50	FRAC	48		P		TBG			
	7:30 - 17:00	9.50	FRAC	34	I	P		SCAN 110 JTS OOH, RD PRS, RU CASD HOLE, PU GAUGE RING, TIH TO 10,519', POOH, PU 10K CBP, TIH SET AT 10,469', POOH RD CASD HOLE, TIH 98 STDS, POOH, LAY DWN TBG ON TLR., SWIFN			
5/15/2014	7:00 - 7:30	0.50	FRAC	48		P		PERF			
	7:30 - 18:30	11.00	FRAC	37	E	P		CONT LAYING TBG DWN ON TLR, ND BOP'S, NU 7" 10K FRAC VALVE, FILL CSG WITH FLUID, RU CAMERON , TEST CSG PER PROCEDURE, TEST FAILED, PRESSURE UP TO 6200#, LOST 495 IN 15 MIN,RD CAMERON RU CASD HOLE, PU 10K CBP, TIH TO 10459', SET CBP WITH 2000# PSI ON CSG, POOH, RD CASD HOLE, RU CAMERON, TEST WELL AS PER PROCEDURE, 6200#, LOSS 502# 15 MIN, TEST FAILED.CALLED FOR PACKER TO TEST CSG, SWIFN.			
5/16/2014	7:00 - 7:30	0.50	FRAC	48		P		TEST CSG			
	7:30 - 15:00	7.50	FRAC	52	B	P		FILL CSG WITH FLUID, PRESSURE UP TO 4000#, POSSIBLE CAMERON EQUIP LEAKING BACK THRU UNIT, CALL FOR B&C QUICK TEST, RU B&C, PRESSURE UP TO 5200#, 10 MIN, LITTLE LOSS, PRESSURE UP TO 6200#, 15 MIN, LOST 50#, RD B&C, RD RIG, MOVE EQUIP OFF LOC, SWIFWE, READY TO PERF & FRAC MONDAY			
5/19/2014	6:00 - 6:30	0.50	FRAC	48		P		JSA-SAFETY MEETING, NABORS AND CASEHOLE			
	6:30 - 8:00	1.50	FRAC	37	B	P		R/U CASD HOLE WIRELINE RIH W/ 3 1/8" PERF GUNS, PERF STAGE #1 AS SAY IN PROCDURE, R/D WIRELINE			
	8:00 - 11:15	3.25	FRAC	46	E	P		WAIT ON RESTRAINT FOR PUMP LINE,			
	11:15 - 12:50	1.58	FRAC	36	E	P		PRESSURE TEST SURFACE LINE TO 7000#, SET POP OFF @ 5900# 1.REFER TO STIMULATION PJR FOR FLUID, SAND AND CHEMICAL VOLUME, ALL STAGES WERE PERFORATED ACCORDING TO PERF RECORD IN OPEN WELL, ALL STAGES WERE STIMULATED TO VENDOR POST JOB REPORT.			
								( FRAC STG #1) WHP = 0 #, BRK DN PERFS = 4167 #, @ 4.5 BPM, ISIP = 3301 #, FG = 0.76 , FINAL ISIP = 3372 #, FINAL FG = 0.76			
	12:50 - 14:40	1.83	FRAC	37	B	P		STG #2, RU WIRELINE, RIH W/ 3 1/8" PERF GUNS AND CBP, SET CBP AND PERF STG #2 AS SAY IN PROCEDURE			

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No:
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 5/31/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	14:40 - 15:40	1.00	FRAC	36	E	P		( FRAC STG #2) WHP = 2658 #, BRK DN PERFS = 5208 #, @ = 3.2 BPM, ISIP = 3929 #, FG = 0.82, FINAL ISIP = 3336 #, FINAL FG = 0.79
	15:40 - 17:00	1.33	FRAC	37	B	P		STG #3, R/U WIRELINE RIH W/ 3 1/8" PERF GUNS AND CBP, SET CBP AND PERF STG #2 AS SAY IN PROCEDURE
	17:00 - 19:00	2.00	FRAC	36	E	P		( FRAC STG #3) WHP = 2973 #, PUMP 40 BBLS TO GET BREAK FOR ACID TO HIT PERF, BRK DN PERFS = 4613 #, @ 3.3 BPM, ISIP = 3420 #, F.G = 0.79 , FINAL ISIP = 326 #, FINAL F.G. = 0.77
5/20/2014	6:30 - 7:00	0.50	FRAC	48		P		SHUT WELL IN SDFN
	7:00 - 8:00	1.00	FRAC	37	C	P		JSA-SAFETY MEETING, PERF AND FRAC
	8:00 - 8:40	0.67	FRAC	36	E	P		STG # 4, R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #4 AS SAY IN PROCEDURE
	8:40 - 9:55	1.25	FRAC	37	C	P		( FRAC STG #4) WHP =2233 #, BRK DN PERFS = 4532 #, @ 2.5 BPM, ISIP = 3247 #, FG = 0.78 , FINAL ISIP = 3270#, FINAL FG = 0.78 ,
	9:55 - 10:35	0.67	FRAC	36	E	P		STG # 5 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #5 AS SAY IN PROCEDURE
	10:35 - 11:35	1.00	FRAC	37	C	P		( FRAC STG #5 ) WHP = 2307 #, BRK DN PERFS = 3862 #, @ = 3.4 BPM, ISIP = 3088 #, F G = 0.78 , FINAL ISIP = 3372 #, FINAL F G = 0.81 ,
	11:35 - 12:40	1.08	FRAC	36	E	P		STG # 6 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #6 AS SAY IN PROCEDURE
	12:40 - 13:40	1.00	FRAC	37	C	P		( FRAC STG #6 ) WHP = 2886#, BRK DN PERFS = 5605 #, @ = 3.6 BPM, ISIP = 3930 #, F G = 0.89 , FINAL ISIP = 3010 #, FINAL F G = 0.78 ,
	13:40 - 14:40	1.00	FRAC	36	E	P		STG # 7 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #7 AS SAY IN PROCEDURE
	14:40 - 15:45	1.08	FRAC	37	C	P		( FRAC STG #7 ) WHP = 2352 #, BRK DN PERFS = 4741 #, @ = 3.5 BPM, ISIP = 3338#, F G = 0.83 , FINAL ISIP = 2925 #, FINAL F G = 0.78 ,
	15:45 - 16:50	1.08	FRAC	36	E	P		STG # 8 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #8 AS SAY IN PROCEDURE
	16:50 - 17:45	0.92	FRAC	37	C	P		( FRAC STG #8 ) WHP = 2440 #, BRK DN PERFS = 5609 #, @ 5 BPM, ISIP = 4012 #, F G = 0.92 , FINAL ISIP = 2953 #, FINAL F G = 0.79 ,
	17:45 - 18:30	0.75	FRAC	36	E	P		STG # 9 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #9 AS SAY IN PROCEDURE
								( FRAC STG #9 ) WHP = 2081 #, BRK DN PERFS = 2871 #, @ 3.6 BPM, ISIP = 2596 #, COULD ONLY GET 24 B/M AT 5400#, SHUT DN SHUT WELL IN SDFN

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No:
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 5/31/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
5/21/2014	6:30 - 6:45	0.25	FRAC	48		P		JSA-SAFETY MEETING
	6:45 - 7:20	0.58	FRAC	36	E	P		STG #9, WHP 1729#, BRK DN PERFS = 2871 #, @ 3.6 BPM, ISIP = 2596 #, FG = 0.92 , FINAL ISIP = 3184 #, FINAL FG = 0.83
	7:20 - 8:25	1.08	FRAC	37	C	P		STG # 10 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PERF STG #10 AS SAY IN PROCEDURE
	8:25 - 9:20	0.92	FRAC	36	E	P		( FRAC STG #10) WHP = 2666 #, TRY TO BREAK PERF DN W/ PRESSURE TO 5900#, BLEEED DN TO 4000#, COULD NOT PUMP INTO PERF,
	9:20 - 10:25	1.08	FRAC	34		P		R/U DUMP BAILER, RIH W/ 10 GAL 10% ACID, DUMP BAIL ACID ACROSS PERF,
	10:25 - 10:50	0.42	FRAC	36	E	P		STG # 10, BREAK DN 5413# 3.4 B/M, START PUMP W/ PRESSURE AT 5490# AT 16 B/M, COULD NOT GET A GOOD PUMP IN RATE, SHUT DN SKIP ZONE,
	10:50 - 12:55	2.08	FRAC	37	C	P		STG # 11 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PERF STG #11 AS SAY IN PROCEDURE, RIH W/ DUMP BAILER, DUMP ACID ACROSS PERF,
	12:55 - 13:55	1.00	FRAC	36	E	P		( FRAC STG #11) WHP = 2168 #, BRK DN PERFS = 3534#, @ 3.5 BPM, ISIP = 2442 #, FG = 0.78 , FINAL ISIP = 2507 #, FINAL FG = 0.78
	13:55 - 14:40	0.75	FRAC	37	C	P		STG # 12 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PERF STG #12 AS SAY IN PROCEDURE
	14:40 - 15:15	0.58	FRAC	36	E	P		( FRAC STG #12 ) WHP = 2212 #, BRK DN PERFS = 4285#, @ 5 BPM, ISIP = 2605 #, FG = 0.83 , FINAL ISIP = 1906 #, FINAL FG = 0.73
	15:15 - 18:20	3.08	FRAC	37	C	P		STG # 13 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET DN @ 3190', P/U RIH W/ HANG UP, P/O HOLE W/ CBP AND GUNS W/ DRAGGING HEAVEY OUT, BOTTOM SLIP BROKE ON PLUG, RETRIVE ALL SLIPS PARTS, RIH W/ CBP AND PERF GUNS, SET CBP AND PERF STG #13 AS SAY IN PROCEDURE
	18:20 - 18:50	0.50	FRAC	36	E	P		( FRAC STG #13) WHP = 1538 #, BRK DN PERFS = 4745 #, @ 4 BPM, ISIP = 1323 #, FG = 0.65 ,
	18:50 - 19:30	0.67	FRAC	34	I	P		FINAL ISIP = 1766 #, FINAL FG = 0.72 ( KILL PLUG ) RIH W/ WEATHERFORD 8K 7" CBP SET CBP 6112', R/D WIRELINE AND FRAC CREW
								395938# 30/50 SAND 19173 BBLS FRESH WATER
5/22/2014	7:00 - 7:15	0.25	DRLOUT	48		P		JSA-SAFETY MEETING
	7:15 - 12:00	4.75	FRAC	36	1	P		R/D NABORS FRAC EQUIP, MOVE OFF LOC.
	12:00 - 15:00	3.00	DRLOUT	30	A	P		MIRU SERVICE UNIT, N/D FRAC VALVES, N/U BOP, R/U DRILLING EQUIP, SHUT WELL IN, SDFN
5/23/2014	7:00 - 7:15	0.25	DRLOUT	48		P		JSA-SAFETY MEETING
	7:15 - 15:00	7.75	DRLOUT	31	I	P		P/U 6 1/8" BIT AND PUMP OPEN BIT SUB RIH W/ 2 3/8" P-110 TBG, TAG KILL PLUG @ 6100', R/U DRILLING EQUIP, SHUTWELL IN SDFWE,
5/27/2014	7:00 - 7:30	0.50	DRLOUT	48		P		MILLING PLUGS

## US ROCKIES REGION

## Operation Summary Report

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No:
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 5/31/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	7:30 - 18:00	10.50	DRLOUT	44	C	P		NU PUMP, BREAK CIRC, TEST BOP'S TO 3000#, TAG KILL PLUG, PLUG DROPPED 2 JTS DURING PRESSURE TSET, MILL ON CBP, POOR CIRC, RU WEATHERFORD, BREAK CIRC, MILL ON CBP, 1ST CBP, 3 HRS, 15 MIN, 2ND CBP 35 MIN, LOST CIRC, RU FOAM UNIT, 2 HRS TO BREAK CIRC, CONT MILLING 3RD PLUG, MILLED PLUG, NO INCREASE, CIRC 20 MIN, KILL TBG, SWIFN
5/28/2014	7:00 - 7:30	0.50	DRLOUT	48		P		MILLING CBP'S
	7:30 - 19:30	12.00	DRLOUT	44	C	P		2000# ON CSG, BLEW WELL, DROPPED TO 0#, WELL DIED, NO FLOW, RU FOAM UNIT, BREAK CIRC, 2:00 HRS, MILL 4TH FLOW THRU PLUG 60 MIN, TIH TAG CBP# 5, BREAK CIRC, FOAM UNIT, WT INDICATOR BROKE, R&R INDICATOR DWN 2 HRS, WELL WON'T FLOW, BREAK CIRC FOAM UNIT 1:45 MIN, MILL# 5, HAD SOME PRESSURE HELP, 25 MIN, PULL TBG, STD BACK 122 STDs, BIT SHOWED NO WEAR, CONES SOLID, REPLACE BIT, SWIFN.
5/29/2014	7:00 - 7:30	0.50	DRLOUT	48		P		WORK WITH FOAM UNIT
	7:30 - 19:00	11.50	DRLOUT	44	D	P		PUMPED 40 BBLS KILL WELL, P/U NEW DRILL BIT TIH 240 JTS TAGGED PLUG RIG UP POWER SWIVEL AND FOAM UNIT, CIRC HOLE, DRILL AND CLEAN OUT 3 CBP, 7TH PLUG DRILLED KICK WAS 400#, RD FOAM UNIT, CIRC CLEAN HOLE, 7 CBP'S LEFT TO D/O, SWIFN
								LAND TUBING @ 6556.82'
								KB 14.00'
								TBG HANGER .83'
								JTS L-80 56 JTS 1733.79' PUP JTS
								L-80 6.00'
								JTS J-55 150 JTS 4797.80'
								SLIDING SLEEVE 4.40'
								FRAC WTR 3454 BBLS
								RCVD 1100 BBLS
								LTR 2354 BBLS
5/30/2014	7:00 - 7:30	0.50	DRLOUT	48		P		MILLING

## US ROCKIES REGION

## Operation Summary Report

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No:
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 5/31/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	7:30 - 19:00	11.50	DRLOUT	44	C	P		<p>TIH TAGGED PLUG #8 PUMPED CIRC HOLE DRILL AND CLEAN OUT CBP, CIRC CLEAN HOLE, MILLED 9,10,11TH PLUG, BOTTOM OF PLUGS SPINNING, HARD TO MILL, SWIFN</p> <p>PLUG# 1 6112' 15' SAND 90 MIN 0# KICK            PLUG# 2 6231' 30' SAND 50 MIN 0# KICK            PLUG# 3 6610' 30' SAND 55 MIN 0# KICK            PLUG# 4 7425' 40' SAND 60 MIN 0# KICK            PLUG# 5 7766' 35' SAND 55 MIN 0# KICK            PLUG# 6 8221' 30' SAND 40 MIN 100# KICK            PLUG# 7 8464' 30' SAND 35 MIN 400# KICK            PLUG# 8 8717' 40' SAND 45 MIN 350# KICK            PLUG# 9 8966' 30' SAND 35 MIN 300# KICK            PLUG# 10 9269' 25' SAND 55 MIN 350# KICK            PLUG# 11 9739' 30' SAND 25 MIN 100# KICK            PLUG# 12 9953' 60' SAND 20 MIN 300# KICK            PLUG# 13 10229' ' SAND MIN 0# KICK            PLUG# 14 10459' 0' SAND MIN 0# KICK            PLUG# 15 10469' 0' SAND MIN 0# KICK</p> <p>LAND TUBING @ 9978.90'</p> <p>KB 26.00'            TBG HANGER .83'            JTS P-110 315 JTS 9947.54'            SLIDING SLEEVE 4.40' EOT            9978.90'</p> <p>FRAC WTR 19,210 BBLS            RCVD TO DATE 6,292 BBLS            LTR BBLS</p>
5/31/2014	7:00 - 7:30	0.50	DRLOUT	48		P		HSM, WORKING W/ POWER SWIVEL DRILLING 7" PLUGS.



## US ROCKIES REGION

## Operation Summary Report

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No:
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 5/31/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	7:30 - 15:00	7.50	DRLOUT	44	C	P		<p>SICP 3,000, OPEN TO FB TNK, RIH TAG DRILL 1/2 OF 12TH PLUG @ 10,198' RIH</p> <p>C/O 31' SAND TAG 13TH PLG @ 10,229' DRL PLUG IN MINS, PSI INCREASE RIH TAG UP ON 1/2 OF 13TH PLUG @ 10,377' DRILLED DWN TO 10,387 NOT MAKING ANY HOLE TORQUEING UP HAVING TO PULL 18,000 OVER TO GET LOOSE, BTM PERF @ 10,439', NEXT PLUG @ 10,459', 72' LEFT TO C/O. RD SWIVEL L/D 13 JTS, LAND TBG ND BOPS DROPPED BALL, WHILE NU WH TBG STARTED FLOWING GOT WH TIGHT OPEN TO FB TNK FLOWED OUT BALL, PUMP OPEN SUB IS OPEN.TURN TO FB, WIND BLOWING TO HARD TO RIG DOWN, CREW WILL COME BACK MONDAY &amp; RIG DOWN &amp; ROAD RIG TO RANGELY.</p> <p>KB = 26.00'  TBG HANGER = .83'  315 JTS 23/8 P-110 = 9947.54'  PUMP OPEN W/ 6/18/BIT = 6.10'  EOT @ 9980.47'</p> <p>FRAC WTR 19,210 BBLS  RCVD TO DATE 7,852 BBLS  LTR 11,358 BBLS</p> <p>340 JTS 23/8 P-110 HAULED OUT  315 LANDED  25 TO RETURN</p>

US ROCKIES REGION

1 General

1.1 Customer Information

Company	US ROCKIES REGION	
Representative		
Address		

1.2 Well/Wellbore Information

Well	NBU 920-13B	Wellbore No.	OH
Well Name	NBU 920-13B	Wellbore Name	NBU 920-13B
Report No.	1	Report Date	5/20/2014
Project	UTAH-UINTAH	Site	NBU 920-13B
Rig Name/No.		Event	RECOMPL/RESERVE/ADD
Start Date	5/12/2014	End Date	5/31/2014
Spud Date	9/29/2010	Active Datum	RKB @4,794.00usft (above Mean Sea Level)
UWI	NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

1.3 General

Contractor		Job Method		Supervisor	
Perforated Assembly		Conveyed Method			

1.4 Initial Conditions

Fluid Type		Fluid Density		Gross Interval	6,162.0 (usft)	-10,439.0 (us	Start Date/Time	5/20/2014 12:00AM
Surface Press		Estimate Res Press		No. of Intervals	86	End Date/Time	5/20/2014 12:00AM	
TVD Fluid Top		Fluid Head		Total Shots	312	Net Perforation Interval	104.00 (usft)	
Hydrostatic Press		Press Difference		Avg Shot Density	3.00 (shot/ft)	Final Surface Pressure		
Balance Cond	NEUTRAL					Final Press Date		

1.5 Summary

2 Intervals

2.1 Perforated Interval

Date	Formation/Reservoir	CCL@ (usft)	CCL-T S (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/20/2014 12:00AM	WASATCH/			6,162.0	6,164.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N

## US ROCKIES REGION

## 2.1 Perforated Interval (Continued)

Date	Formation/ Reservoir	CCL@ (usft)	CCL-T S (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/20/2014 12:00AM	WASATCH/			6,176.0	6,178.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			6,194.0	6,196.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			6,199.0	6,201.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			6,546.0	6,550.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			6,576.0	6,580.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,173.0	7,174.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,241.0	7,242.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,303.0	7,304.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,325.0	7,326.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,337.0	7,338.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,377.0	7,378.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,397.0	7,398.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,411.0	7,412.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,435.0	7,436.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,441.0	7,442.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,471.0	7,472.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,537.0	7,538.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,552.0	7,553.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,636.0	7,637.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			7,734.0	7,736.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,003.0	8,004.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N

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## US ROCKIES REGION

## 2.1 Perforated Interval (Continued)

Date	Formation/ Reservoir	CCL@ (usft)	CCL-T S (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/20/2014 12:00AM	WASATCH/			8,075.0	8,076.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,094.0	8,095.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,121.0	8,122.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,168.0	8,169.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,173.0	8,174.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,189.0	8,191.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,231.0	8,232.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,255.0	8,256.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,307.0	8,308.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,316.0	8,317.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	WASATCH/			8,330.0	8,331.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,396.0	8,397.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,426.0	8,427.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,443.0	8,444.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,514.0	8,515.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,554.0	8,555.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,616.0	8,617.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,641.0	8,642.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,672.0	8,674.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,695.0	8,697.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,728.0	8,729.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N

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## US ROCKIES REGION

## 2.1 Perforated Interval (Continued)

Date	Formation/ Reservoir	CCL@ (usft)	CCL-T S (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/20/2014 12:00AM	MESAVERDE/			8,745.0	8,746.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,771.0	8,772.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,787.0	8,788.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,815.0	8,816.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,877.0	8,878.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,896.0	8,897.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,935.0	8,936.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			8,979.0	8,980.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,007.0	9,008.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,023.0	9,024.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,043.0	9,044.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,206.0	9,207.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,222.0	9,223.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,237.0	9,239.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,546.0	9,547.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,565.0	9,566.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,606.0	9,607.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,622.0	9,623.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,694.0	9,695.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,712.0	9,713.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,717.0	9,719.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N

## US ROCKIES REGION

## 2.1 Perforated Interval (Continued)

Date	Formation/ Reservoir	CCL@ (usft)	CCL-T S (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diameter (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/20/2014 12:00AM	MESAVERDE/			9,752.0	9,753.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,778.0	9,779.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,838.0	9,839.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,847.0	9,848.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,879.0	9,880.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,903.0	9,904.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			9,938.0	9,940.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,014.0	10,015.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,042.0	10,043.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,081.0	10,082.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,161.0	10,162.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,178.0	10,179.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,193.0	10,194.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,214.0	10,216.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,239.0	10,240.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,260.0	10,261.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,282.0	10,283.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,334.0	10,335.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,345.0	10,346.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,369.0	10,370.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N
5/20/2014 12:00AM	MESAVERDE/			10,411.0	10,412.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO	N



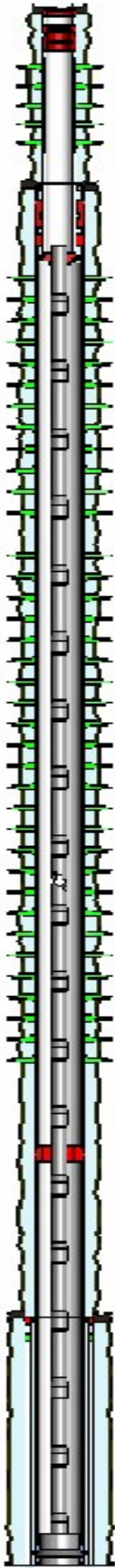
US ROCKIES REGION

2.1 Perforated Interval (Continued)

Date	Formation/ Reservoir	CCL@ (usft)	CCL-T S (usft)	MD Top (usft)	MD Base (usft)	Shot Density (shot/ft)	Misfires/ Add. Shot	Diamete r (in)	Carr Type /Stage No	Carr Size (in)	Phasing (°)	Charge Desc /Charge Manufacturer	Charge Weight (gram)	Reason	Misrun
5/20/2014 12:00AM	MESAVERDE/			10,438.0	10,439.0	3.00		0.410	EXP/	3.125	120.00		19.00	PRODUCTIO N	

3 Plots

3.1 Wellbore Schematic



<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> UTU-0579
<b>1. TYPE OF WELL</b> Gas Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b> UTE
<b>2. NAME OF OPERATOR:</b> KERR-MCGEE OIL & GAS ONSHORE, L.P.		<b>7. UNIT or CA AGREEMENT NAME:</b> NATURAL BUTTES
<b>3. ADDRESS OF OPERATOR:</b> P.O. Box 173779 1099 18th Street, Suite 600, Denver, CO, 80217 3779		<b>8. WELL NAME and NUMBER:</b> NBU 920-13B
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0925 FNL 1555 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 13 Township: 09.0S Range: 20.0E Meridian: S		<b>9. API NUMBER:</b> 43047501520000
<b>10. FIELD and POOL or WILDCAT:</b> NATURAL BUTTES		<b>COUNTY:</b> UINTAH
<b>11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA</b>		<b>STATE:</b> UTAH
<b>TYPE OF SUBMISSION</b>  <input type="checkbox"/> NOTICE OF INTENT Approximate date work will start:  <input checked="" type="checkbox"/> SUBSEQUENT REPORT Date of Work Completion: 10/27/2014  <input type="checkbox"/> SPUD REPORT Date of Spud:  <input type="checkbox"/> DRILLING REPORT Report Date:	<b>TYPE OF ACTION</b>  <div style="display: flex; flex-wrap: wrap;"> <div style="width: 33%;"> <input type="checkbox"/> ACIDIZE   <input type="checkbox"/> CHANGE TO PREVIOUS PLANS   <input type="checkbox"/> CHANGE WELL STATUS   <input type="checkbox"/> DEEPEN   <input type="checkbox"/> OPERATOR CHANGE   <input type="checkbox"/> PRODUCTION START OR RESUME   <input type="checkbox"/> REPERFORATE CURRENT FORMATION   <input type="checkbox"/> TUBING REPAIR   <input type="checkbox"/> WATER SHUTOFF   <input type="checkbox"/> WILDCAT WELL DETERMINATION         </div> <div style="width: 33%;"> <input type="checkbox"/> ALTER CASING   <input type="checkbox"/> CHANGE TUBING   <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS   <input type="checkbox"/> FRACTURE TREAT   <input type="checkbox"/> PLUG AND ABANDON   <input type="checkbox"/> RECLAMATION OF WELL SITE   <input type="checkbox"/> SIDETRACK TO REPAIR WELL   <input type="checkbox"/> VENT OR FLARE   <input type="checkbox"/> SI TA STATUS EXTENSION         </div> <div style="width: 33%;"> <input type="checkbox"/> CASING REPAIR   <input type="checkbox"/> CHANGE WELL NAME   <input type="checkbox"/> CONVERT WELL TYPE   <input type="checkbox"/> NEW CONSTRUCTION   <input type="checkbox"/> PLUG BACK   <input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION   <input type="checkbox"/> TEMPORARY ABANDON   <input type="checkbox"/> WATER DISPOSAL   <input type="checkbox"/> APD EXTENSION         </div> </div> <div style="display: flex; justify-content: space-between; margin-top: 10px;"> <input checked="" type="checkbox"/> OTHER         <div style="border: 1px solid black; padding: 2px;">Drill Out Plugs</div> </div>	
<b>12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.</b> Kerr-McGee Oil & Gas Onshore, LP has drilled out the remaining two iso plugs on the subject well. The well was recompleted with iso plugs at 10,469 ft and 10,459 ft and due to equipment issues, the plugs were left in the hole. This is a state courtesy copy. Please see the attached daily operations report for details. Thank you.		
<b>NAME (PLEASE PRINT)</b> Kristina Geno		<b>PHONE NUMBER</b> 720 929-6824
<b>SIGNATURE</b> N/A		<b>TITLE</b> Regulatory Analyst
<b>DATE</b> 11/3/2014		

**Accepted by the**  
**Utah Division of**  
**Oil, Gas and Mining**  
**FOR RECORD ONLY**  
 November 03, 2014

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B				Spud Conductor: 9/27/2010				Spud Date: 9/29/2010			
Project: UTAH-UINTAH				Site: NBU 920-13B				Rig Name No: MILES-GRAY 1/1, SWABBCO 6/6			
Event: RECOMPL/RESEREVEADD				Start Date: 5/12/2014				End Date: 10/27/2014			
Active Datum: RKB @4,794.00usft (above Mean Sea Level)				UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0							
Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation			
5/13/2014	7:00 - 7:30	0.50	FRAC	48	I	P		SCAN TBG			
	7:30 - 17:00	9.50	FRAC	45	A	P		RD, ROAD RIG FROM LOVE 1121-16L TO LOC, MIRU, BLOW DWN WELL, KILL WELL 20 BBLS TBG-CSG, NDWH, NU BOP'S, TEST BOP'S, UNLAND TBG, SCAN TBG OOH, STD BACK 98 STDS, LAY DWN 24 JTS TBG ON TLR. NOTE: CSG IS 7" 26#, 112 JTS IN HOLE, EOT 3528', SWIFN			
5/14/2014	7:00 - 7:30	0.50	FRAC	48		P		TBG			
	7:30 - 17:00	9.50	FRAC	34	I	P		SCAN 110 JTS OOH, RD PRS, RU CASD HOLE, PU GAUGE RING, TIH TO 10,519', POOH, PU 10K CBP, TIH SET AT 10,469', POOH RD CASD HOLE, TIH 98 STDS, POOH, LAY DWN TBG ON TLR., SWIFN			
5/15/2014	7:00 - 7:30	0.50	FRAC	48		P		PERF			
	7:30 - 18:30	11.00	FRAC	37	E	P		CONT LAYING TBG DWN ON TLR, ND BOP'S, NU 7" 10K FRAC VALVE, FILL CSG WITH FLUID, RU CAMERON , TEST CSG PER PROCEDURE, TEST FAILED, PRESSURE UP TO 6200#, LOST 495 IN 15 MIN,RD CAMERON RU CASD HOLE, PU 10K CBP, TIH TO 10459', SET CBP WITH 2000# PSI ON CSG, POOH, RD CASD HOLE, RU CAMERON, TEST WELL AS PER PROCEDURE, 6200#, LOSS 502# 15 MIN, TEST FAILED.CALLED FOR PACKER TO TEST CSG, SWIFN.			
5/16/2014	7:00 - 7:30	0.50	FRAC	48		P		TEST CSG			
	7:30 - 15:00	7.50	FRAC	52	B	P		FILL CSG WITH FLUID, PRESSURE UP TO 4000#, POSSIBLE CAMERON EQUIP LEAKING BACK THRU UNIT, CALL FOR B&C QUICK TEST, RU B&C, PRESSURE UP TO 5200#, 10 MIN, LITTLE LOSS, PRESSURE UP TO 6200#, 15 MIN, LOST 50#, RD B&C, RD RIG, MOVE EQUIP OFF LOC, SWIFWE, READY TO PERF & FRAC MONDAY			
5/19/2014	6:00 - 6:30	0.50	FRAC	48		P		JSA-SAFETY MEETING, NABORS AND CASEHOLE			
	6:30 - 8:00	1.50	FRAC	37	B	P		R/U CASD HOLE WIRELINE RIH W/ 3 1/8" PERF GUNS, PERF STAGE #1 AS SAY IN PROCDURE, R/D WIRELINE			
	8:00 - 11:15	3.25	FRAC	46	E	P		WAIT ON RESTRAINT FOR PUMP LINE,			
	11:15 - 12:50	1.58	FRAC	36	E	P		PRESSURE TEST SURFACE LINE TO 7000#, SET POP OFF @ 5900# 1.REFER TO STIMULATION PJR FOR FLUID, SAND AND CHEMICAL VOLUME, ALL STAGES WERE PERFORATED ACCORDING TO PERF RECORD IN OPEN WELL, ALL STAGES WERE STIMULATED TO VENDOR POST JOB REPORT.			
								( FRAC STG #1) WHP = 0 #, BRK DN PERFS = 4167 #, @ 4.5 BPM, ISIP = 3301 #, FG = 0.76 , FINAL ISIP = 3372 #, FINAL FG = 0.76			
	12:50 - 14:40	1.83	FRAC	37	B	P		STG #2, R/U WIRELINE, RIH W/ 3 1/8" PERF GUNS AND CBP, SET CBP AND PERF STG #2 AS SAY IN PROCDURE			

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No: MILES-GRAY 1/1, SWABBCO 6/6
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 10/27/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	14:40 - 15:40	1.00	FRAC	36	E	P		( FRAC STG #2) WHP = 2658 #, BRK DN PERFS = 5208 #, @ = 3.2 BPM, ISIP = 3929 #, FG = 0.82, FINAL ISIP = 3336 #, FINAL FG = 0.79
	15:40 - 17:00	1.33	FRAC	37	B	P		STG #3, R/U WIRELINE RIH W/ 3 1/8" PERF GUNS AND CBP, SET CBP AND PERF STG #2 AS SAY IN PROCEDURE
	17:00 - 19:00	2.00	FRAC	36	E	P		( FRAC STG #3) WHP = 2973 #, PUMP 40 BBLS TO GET BREAK FOR ACID TO HIT PERF, BRK DN PERFS = 4613 #, @ 3.3 BPM, ISIP = 3420 #, F.G = 0.79 , FINAL ISIP = 326 #, FINAL F.G. = 0.77
								SHUT WELL IN SDFN
5/20/2014	6:30 - 7:00	0.50	FRAC	48		P		JSA-SAFETY MEETING, PERF AND FRAC
	7:00 - 8:00	1.00	FRAC	37	C	P		STG # 4, R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #4 AS SAY IN PROCEDURE
	8:00 - 8:40	0.67	FRAC	36	E	P		( FRAC STG #4) WHP =2233 #, BRK DN PERFS = 4532 #, @ 2.5 BPM, ISIP = 3247 #, FG = 0.78 , FINAL ISIP = 3270#, FINAL FG = 0.78 ,
	8:40 - 9:55	1.25	FRAC	37	C	P		STG # 5 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #5 AS SAY IN PROCEDURE
	9:55 - 10:35	0.67	FRAC	36	E	P		( FRAC STG #5 ) WHP = 2307 #, BRK DN PERFS = 3862 #, @ = 3.4 BPM, ISIP = 3088 #, F G = 0.78 , FINAL ISIP = 3372 #, FINAL F G = 0.81 ,
	10:35 - 11:35	1.00	FRAC	37	C	P		STG # 6 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #6 AS SAY IN PROCEDURE
	11:35 - 12:40	1.08	FRAC	36	E	P		( FRAC STG #6 ) WHP = 2886#, BRK DN PERFS = 5605 #, @ = 3.6 BPM, ISIP = 3930 #, F G = 0.89 , FINAL ISIP = 3010 #, FINAL F G = 0.78 ,
	12:40 - 13:40	1.00	FRAC	37	C	P		STG # 7 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #7 AS SAY IN PROCEDURE
	13:40 - 14:40	1.00	FRAC	36	E	P		( FRAC STG #7 ) WHP = 2352 #, BRK DN PERFS = 4741 #, @ = 3.5 BPM, ISIP = 3338#, F G = 0.83 , FINAL ISIP = 2925 #, FINAL F G = 0.78 ,
	14:40 - 15:45	1.08	FRAC	37	C	P		STG # 8 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #8 AS SAY IN PROCEDURE
	15:45 - 16:50	1.08	FRAC	36	E	P		( FRAC STG #8 ) WHP = 2440 #, BRK DN PERFS = 5609 #, @ 5 BPM, ISIP = 4012 #, F G = 0.92 , FINAL ISIP = 2953 #, FINAL F G = 0.79 ,
	16:50 - 17:45	0.92	FRAC	37	C	P		STG # 9 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PER STG #9 AS SAY IN PROCEDURE
	17:45 - 18:30	0.75	FRAC	36	E	P		( FRAC STG #9 ) WHP = 2081 #, BRK DN PERFS = 2871 #, @ 3.6 BPM, ISIP = 2596 #, COULD ONLY GET 24 B/M AT 5400#, SHUT DN SHUT WELL IN SDFN

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B			Rig Name No: MILES-GRAY 1/1, SWABBCO 6/6
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 10/27/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
5/21/2014	6:30 - 6:45	0.25	FRAC	48		P		JSA-SAFETY MEETING
	6:45 - 7:20	0.58	FRAC	36	E	P		STG #9, WHP 1729#, BRK DN PERFS = 2871 #, @ 3.6 BPM, ISIP = 2596 #, FG = 0.92 , FINAL ISIP = 3184 #, FINAL FG = 0.83
	7:20 - 8:25	1.08	FRAC	37	C	P		STG # 10 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PERF STG #10 AS SAY IN PROCEDURE
	8:25 - 9:20	0.92	FRAC	36	E	P		( FRAC STG #10) WHP = 2666 #, TRY TO BREAK PERF DN W/ PRESSURE TO 5900#, BLEED DN TO 4000#, COULD NOT PUMP INTO PERF,
	9:20 - 10:25	1.08	FRAC	34		P		R/U DUMP BAILER, RIH W/ 10 GAL 10% ACID, DUMP BAIL ACID ACROSS PERF,
	10:25 - 10:50	0.42	FRAC	36	E	P		STG # 10, BREAK DN 5413# 3.4 B/M, START PUMP W/ PRESSURE AT 5490# AT 16 B/M, COULD NOT GET A GOOD PUMP IN RATE, SHUT DN SKIP ZONE,
	10:50 - 12:55	2.08	FRAC	37	C	P		STG # 11 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PERF STG #11 AS SAY IN PROCEDURE, RIH W/ DUMP BAILER, DUMP ACID ACROSS PERF,
	12:55 - 13:55	1.00	FRAC	36	E	P		( FRAC STG #11) WHP = 2168 #, BRK DN PERFS = 3534#, @ 3.5 BPM, ISIP = 2442 #, FG = 0.78 , FINAL ISIP = 2507 #, FINAL FG = 0.78
	13:55 - 14:40	0.75	FRAC	37	C	P		STG # 12 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET CBP AND PERF STG #12 AS SAY IN PROCEDURE
	14:40 - 15:15	0.58	FRAC	36	E	P		( FRAC STG #12 ) WHP = 2212 #, BRK DN PERFS = 4285#, @ 5 BPM, ISIP = 2605 #, FG = 0.83 , FINAL ISIP = 1906 #, FINAL FG = 0.73
	15:15 - 18:20	3.08	FRAC	37	C	P		STG # 13 R/U WIRELINE RIH W/ PERF GUNS AND CBP, SET DN @ 3190', P/U RIH W/ HANG UP, P/O HOLE W/ CBP AND GUNS W/ DRAGGING HEAVEY OUT, BOTTOM SLIP BROKE ON PLUG, RETRIVE ALL SLIPS PARTS, RIH W/ CBP AND PERF GUNS, SET CBP AND PERF STG #13 AS SAY IN PROCEDURE
	18:20 - 18:50	0.50	FRAC	36	E	P		( FRAC STG #13) WHP = 1538 #, BRK DN PERFS = 4745 #, @ 4 BPM, ISIP = 1323 #, FG = 0.65 , FINAL ISIP = 1766 #, FINAL FG = 0.72
	18:50 - 19:30	0.67	FRAC	34	I	P		( KILL PLUG ) RIH W/ WEATHERFORD 8K 7" CBP SET CBP 6112', R/D WIRELINE AND FRAC CREW
								395938# 30/50 SAND 19102 BBLS FRESH WATER
5/22/2014	7:00 - 7:15	0.25	DRLOUT	48		P		JSA-SAFETY MEETING
	7:15 - 12:00	4.75	FRAC	36	1	P		R/D NABORS FRAC EQUIP, MOVE OFF LOC.
	12:00 - 15:00	3.00	DRLOUT	30	A	P		MIRU SERVICE UNIT, N/D FRAC VALVES, N/U BOP, R/U DRILLING EQUIP, SHUT WELL IN, SDFN
5/23/2014	7:00 - 7:15	0.25	DRLOUT	48		P		JSA-SAFETY MEETING
	7:15 - 15:00	7.75	DRLOUT	31	I	P		P/U 6 1/8" BIT AND PUMP OPEN BIT SUB RIH W/ 2 3/8" P-110 TBG, TAG KILL PLUG @ 6100', R/U DRILLING EQUIP, SHUTWELL IN SDFWE,
5/27/2014	7:00 - 7:30	0.50	DRLOUT	48		P		MILLING PLUGS

## US ROCKIES REGION

## Operation Summary Report

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B		Rig Name No: MILES-GRAY 1/1, SWABBCO 6/6	
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 10/27/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)		UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0			

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	7:30 - 18:00	10.50	DRLOUT	44	C	P		NU PUMP, BREAK CIRC, TEST BOP'S TO 3000#, TAG KILL PLUG, PLUG DROPPED 2 JTS DURING PRESSURE TSET, MILL ON CBP, POOR CIRC, RU WEATHERFORD, BREAK CIRC, MILL ON CBP, 1ST CBP, 3 HRS, 15 MIN, 2ND CBP 35 MIN, LOST CIRC, RU FOAM UNIT, 2 HRS TO BREAK CIRC, CONT MILLING 3RD PLUG, MILLED PLUG, NO INCREASE, CIRC 20 MIN, KILL TBG, SWIFN
5/28/2014	7:00 - 7:30	0.50	DRLOUT	48		P		MILLING CBP'S
	7:30 - 19:30	12.00	DRLOUT	44	C	P		2000# ON CSG, BLEW WELL, DROPPED TO 0#, WELL DIED, NO FLOW, RU FOAM UNIT, BREAK CIRC, 2:00 HRS, MILL 4TH FLOW THRU PLUG 60 MIN, TIH TAG CBP# 5, BREAK CIRC, FOAM UNIT, WT INDICATOR BROKE, R&R INDICATOR DWN 2 HRS, WELL WON'T FLOW, BREAK CIRC FOAM UNIT 1:45 MIN, MILL# 5, HAD SOME PRESSURE HELP, 25 MIN, PULL TBG, STD BACK 122 STDs, BIT SHOWED NO WEAR, CONES SOLID, REPLACE BIT, SWIFN.
5/29/2014	7:00 - 7:30	0.50	DRLOUT	48		P		WORK WITH FOAM UNIT
	7:30 - 19:00	11.50	DRLOUT	44	D	P		PUMPED 40 BBLS KILL WELL, P/U NEW DRILL BIT TIH 240 JTS TAGGED PLUG RIG UP POWER SWIVEL AND FOAM UNIT, CIRC HOLE, DRILL AND CLEAN OUT 3 CBP, 7TH PLUG DRILLED KICK WAS 400#, RD FOAM UNIT, CIRC CLEAN HOLE, 7 CBP'S LEFT TO D/O, SWIFN
								LAND TUBING @ 6556.82'
								KB 14.00'
								TBG HANGER .83'
								JTS L-80 56 JTS 1733.79' PUP JTS
								L-80 6.00'
								JTS J-55 150 JTS 4797.80'
								SLIDING SLEEVE 4.40'
								FRAC WTR 3454 BBLS
								RCVD 1100 BBLS
								LTR 2354 BBLS
5/30/2014	7:00 - 7:30	0.50	DRLOUT	48		P		MILLING



## US ROCKIES REGION

## Operation Summary Report

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B		Rig Name No: MILES-GRAY 1/1, SWABBCO 6/6	
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 10/27/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)			UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0		

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	7:30 - 19:00	11.50	DRLOUT	44	C	P		<p>TIH TAGGED PLUG #8 PUMPED CIRC HOLE DRILL AND CLEAN OUT CBP, CIRC CLEAN HOLE, MILLED 9,10,11TH PLUG, BOTTOM OF PLUGS SPINNING, HARD TO MILL, SWIFN</p> <p>PLUG# 1 6112' 15' SAND 90 MIN 0# KICK            PLUG# 2 6231' 30' SAND 50 MIN 0# KICK            PLUG# 3 6610' 30' SAND 55 MIN 0# KICK            PLUG# 4 7425' 40' SAND 60 MIN 0# KICK            PLUG# 5 7766' 35' SAND 55 MIN 0# KICK            PLUG# 6 8221' 30' SAND 40 MIN 100# KICK            PLUG# 7 8464' 30' SAND 35 MIN 400# KICK            PLUG# 8 8717' 40' SAND 45 MIN 350# KICK            PLUG# 9 8966' 30' SAND 35 MIN 300# KICK            PLUG# 10 9269' 25' SAND 55 MIN 350# KICK            PLUG# 11 9739' 30' SAND 25 MIN 100# KICK            PLUG# 12 9953' 60' SAND 20 MIN 300# KICK            PLUG# 13 10229' ' SAND MIN 0# KICK            PLUG# 14 10459' 0' SAND MIN 0# KICK            PLUG# 15 10469' 0' SAND MIN 0# KICK</p> <p>LAND TUBING @ 9978.90'</p> <p>KB 26.00'            TBG HANGER .83'            JTS P-110 315 JTS 9947.54'            SLIDING SLEEVE 4.40' EOT            9978.90'</p> <p>FRAC WTR 19,210 BBLS            RCVD TO DATE 6,292 BBLS            LTR BBLS</p>
5/31/2014	7:00 - 7:30	0.50	DRLOUT	48		P		HSM, WORKING W/ POWER SWIVEL DRILLING 7" PLUGS.

## US ROCKIES REGION

## Operation Summary Report

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B		Rig Name No: MILES-GRAY 1/1, SWABBCO 6/6	
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 10/27/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)		UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0			

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	7:30 - 15:00	7.50	DRLOUT	44	C	P		SICP 3,000, OPEN TO FB TNK, RIH TAG DRILL 1/2 OF 12TH PLUG @ 10,198' RIH  C/O 31' SAND TAG 13TH PLG @ 10,229' DRL PLUG IN MINS, PSI INCREASE RIH TAG UP ON 1/2 OF 13TH PLUG @ 10,377' DRILLED DWN TO 10,387 NOT MAKING ANY HOLE TORQUEING UP HAVING TO PULL 18,000 OVER TO GET LOOSE, BTM PERF @ 10,439', NEXT PLUG @ 10,459', 72' LEFT TO C/O. RD SWIVEL L/D 13 JTS, LAND TBG ND BOPS DROPPED BALL, WHILE NU WH TBG STARTED FLOWING GOT WH TIGHT OPEN TO FB TNK FLOWED OUT BALL, PUMP OPEN SUB IS OPEN.TURN TO FB, WIND BLOWING TO HARD TO RIG DOWN, CREW WILL COME BACK MONDAY & RIG DOWN & ROAD RIG TO RANGELY.  KB = 26.00' TBG HANGER = .83' 315 JTS 23/8 P-110 = 9947.54' PUMP OPEN W/ 6/18/BIT = 6.10' EOT @ 9980.47'  FRAC WTR 19,210 BBLS RCVD TO DATE 7,852 BBLS LTR 11,358 BBLS  340 JTS 23/8 P-110 HAULED OUT 315 LANDED 25 TO RETURN
	15:00 - 15:00	0.00	DRLOUT	50				WELL TURNED TO SALES @ 14:30 HR ON 5/31/2014. 1.6 MCFD, 1200 BWPD, FCP 1725#, FTP 1300# 20/64" CK.
10/15/2014	7:00 - 7:15	0.25	DRLOUT	48		P		HSM-JSA
	7:15 - 7:15	0.00	DRLOUT	30	A	P		MOVE RIG & EQUIP TO LOC, MIRU, SPOT EQUIP
10/16/2014	7:00 - 7:15	0.25	DRLOUT	48		P		HSM-JSA
	7:15 - 16:00	8.75	DRLOUT	31	I			FTP- 100 PSI, FCP- 100 PSI, CNTRL WELL W/ 40 BBLS TMAC, NDWH, NUBOP, UNLAND TBG POOH W/ 315 JTS 2 3/8" P-110 & XN TBG WAS TORQUED UP TIGHT & HARD TO BRK, PIN END BRK OFF XN LEFT POBS, X/O, & BIT IN WELL, LEFT CSG OPEN TO SALES, SDFN.
10/17/2014	7:00 - 7:15	0.25	DRLOUT	48		P		HSM-JSA
	7:15 - 16:00	8.75	DRLOUT	31	I	P		FCP- 110 PSI, PUMP 180 BBLS TMAC TO CONTROL WELL, PU WASHOVER SHOE, BMPR SUB, JAR, 4 DRL CLRS, & INTENSIFIER RIH W/ 187 JTS TBG, EOT @ 6032' TOP PERF 6162', SWI, SDFWE.
10/20/2014	7:00 - 7:15	0.25	DRLOUT	48		P		HSM, JSA
	7:15 - 10:00	2.75	DRLOUT	31	I	P		SITP=40 PSI, SICP=115 PUMP 20 BBLS TMAC DOWN TBG AND CSG TO CONTROL WELL, FINISH RIH W/ WASHOVER SHOE, BMPR SUB, JAR, 4 DRL CLRS, & INTENSIFIER AND A TOTAL OF 324 JTS 2-3/8" TBG TAGGED FISH @ 10,408'
	10:00 - 12:30	2.50	DRLOUT	44	D	P		P/U PWR SWVL, ESTABLISHED CIRC, CLEAN OUT 1' CIRC WELL.

**US ROCKIES REGION**  
**Operation Summary Report**

Well: NBU 920-13B		Spud Conductor: 9/27/2010		Spud Date: 9/29/2010	
Project: UTAH-UINTAH		Site: NBU 920-13B		Rig Name No: MILES-GRAY 1/1, SWABBCO 6/6	
Event: RECOMPL/RESEREVEADD		Start Date: 5/12/2014		End Date: 10/27/2014	
Active Datum: RKB @4,794.00usft (above Mean Sea Level)		UWI: NW/NE/0/9/S/20/E/13/0/0/26/PM/N/925/E/0/1555/0/0			

Date	Time Start-End	Duration (hr)	Phase	Code	Sub Code	P/U	MD From (usft)	Operation
	12:30 - 16:00	3.50	DRLOUT	31	I	P		R/D PWR SWVL, POOH W/ 162 STDS OF TBG & BHA. L/D W/O SHOE.
	16:00 - 17:30	1.50	DRLOUT	31	I	P		P/U 3-1/2" ID OVERSHOT, RIH W BHA & 21 STDS OF 2-3/8" TBG.SWI . WILL SALE DOWN WELL OVERNIGHT
10/21/2014	7:00 - 7:30	0.50	DRLOUT	48	B	P		FISHING
	7:30 - 17:00	9.50	DRLOUT	31	B	P		TIH TO FISH, LATCH ON FISH, WORK LOOSE, POOH, LAY DWN FISH, FISH ROD BROKE IN MIDDLE OF PUMP THRU VALVE, LEFT HALF VALVE, BIT, BIT SUB IN HOLE, PU OVER SHOT GRAPPLE IN AM, TIH TO LATCH ON BIT SUB, FISH REMAINING PARTS.SWIFN
10/22/2014	7:00 - 7:30	0.50	DRLOUT	48		P		FISHING
	7:30 - 18:30	11.00	DRLOUT	31	B	P		PU OVERSHOT FOR BIT SUB, FISH ASSY, TIH TAG FISH, PU PWR SWIVEL, BREAK CIRC, SET DWN ON FISH, LATCH ON FISH, BROACH TBG TO FISH TO CK TBG ID 9.100", BROACH GOOD, POOH WITH SOME DRAG, STD BACK TBG, PULLED ASSY OOH, HAD FISH BUT LOST 1 CONE IN HOLE.SWIFN
10/23/2014	7:00 - 7:30	0.50	DRLOUT	48		P		FISHING
	7:30 - 17:00	9.50	DRLOUT	31	B	P		BLOW DWN WELL, KILL CSG WITH 30 BBLS TREATED T-MAC, PU MAGNET, TRASH BASKET, X/O SUB TBG, TIH TO 10450', TAG, PU PWR SWIVEL, RU FOAM UNIT, BREAK CIRC, CIRC WELL TO CLEAN OUT SAND, POOH STD TBG BACK, ND FISH ASSY, HAD SOME PARTS OF CONE, SWIFN FOAM, UNIT
10/24/2014	7:00 - 7:30	0.50	DRLOUT	48		P		
	7:30 - 17:30	10.00	DRLOUT	44	C			PU 6 1/4" BIT, BIT SUB, PUMP THRU VALVE, XNSN, TBG, TIH TO 10,387', TAG BOTTOM OF CBP 13, MILL PLUG, TIH TO 10,452 ,MILL 1ST 10K CBP,TIH 10459', MILL ON BTM CBP #14, POOH STD BACK 5 STDS, SWIFWE
10/27/2014	7:00 - 7:30	0.50		48		P		MILLING
	7:30 - 8:30	1.00		44	C	P		1800# CSG, CONT MILLING CBP,TIH TO 10,469', TAG 2ND 10K CBP, MILL PLUG, FALL TO 10,488' TAG BTM CBP
	8:30 - 12:00	3.50		44	C	P		MILL ON BTM HALF CBP, PLUG SPINNING, TRIED TO PUSH PLUG DWN, DIDN'T MOVE,MILLED TO HANGER TOP, 10,492'
	12:00 - 17:00			50	A	P		BREAK CIRC, CIRC CLEAN, ND PWR SWIVEL, ND TECH FOAM, POOH LAY DWN 17 JTS TO 9,982', 314 JTS, BROACH TBG TO SN, LAND TBG, ND BOP'S, NU WH, DROP BALL, PUMP OPEN FLOW THRU VALVE, 1900# RDMO
								KB 26.00' HANGER .83' TBG 314 JTS 9949.16' BTM HOLE ASSY 6.00' EOT 9982.10'